HCD-CP11

SERVICE MANUAL

Ver 1.1 2002. 07

US Model
Canadian Model
AEP Model
UK Model
E Model
Australian Model

HCD-CP11 is the Amplifier, CD player, Tape Deck and Tuner section in CMT-CP11/CP11K.

Dolby noise reduction manufactured under license from Dolby Laboratories Licensing Corporation.
"DOLBY" and the double-D symbol □□ are trade-marks of Dolby Laboratories Licensing Corporation.

CD Section	Model Name Using Similar Mechanism	NEW
	CD Mechanism Type	CDM55D-K5BD41
Tape deck Section	Model Name Using Similar Mechanism	NEW
	Tape Transport Mechanism Type	CMAL1Z212

SPECIFICATIONS

Amplifier section

For the U.S. model

AUDIO POWER SPECIFICATIONS

POWER OUTPUT AND TOTAL HARMONIC DISTORTION:

With 6-ohm loads, both channels driven, from 70 - 20,000 Hz; rated 18 watts per channel minimum RMS power, with no more than 0.9% total harmonic distortion from 250 milliwatts to rated output.

North American model:
Continuous RMS power output (reference):
35 + 35 W
(6 ohms at 1 kHz, 10% THD)
Total harmonic distortion less than 0.07% (6 ohms at 1 kHz, 18 W)

European model:
DIN power output (rated): 30 + 30 W
(6 ohms at 1 kHz, DIN)
Continuous RMS power output (reference):
35 + 35 W
(6 ohms at 1 kHz, 10% THD)
Music power output (reference):
85 + 85 W

Other models:
The following measured at 230 V AC, 60 Hz
DIN power output (rated): 30 + 30 W
(6 ohms at 1 kHz, DIN)
Continuous RMS power output (reference):
35 + 35 W
(6 ohms at 1 kHz, 10% THD)
The following measured at 220 V AC, 60 Hz
DIN power output (rated): 24 + 24 W
(6 ohms at 1 kHz, DIN)
Continuous RMS power output (reference):
27 + 27 W
(6 ohms at 1 kHz, 10% THD)

Inputs
MD IN (phono jacks): Sensitivity 500 mV, impedance 47 kilohms
VIDEO IN (phono jacks): Sensitivity 250 mV, impedance 47 kilohms

Outputs
LINE OUT (phono jacks): Sensitivity 250 mV, impedance 1 kilohm
OPTICAL DIGITAL OUT (CD):
Optical
PHONES (stereo phone jack):
Accepts headphones with an impedance of 8 ohms or more
SPEAKER: Active speaker system, 6 ohms

— Continued on next page —

MICRO Hi-Fi COMPONENT SYSTEM

9-929-095-12
2002G1600-1
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Sony Corporation
Home Audio Company
Published by Sony Engineering Corporation

SONY®

CD player section

System	Compact disc and digital audio system
Laser	Semiconductor laser (λ = 780 nm) Emission duration: continuous
Laser output	MAX 44.6 μW* * This output is the value measured at a distance of 200 mm from the objective lens surface on the optical pick-up block with 7 mm aperture.
Wavelength	780 - 790 nm
Frequency response	2 Hz - 20 kHz (±0.5 dB)

Tape player section

Recording system	4-track 2-channel stereo
Frequency response (DOLBY NR OFF)	50 - 13,000 Hz (±3 dB), using a Sony TYPE I cassette 50 - 14,000 Hz (±3 dB), using a Sony TYPE II cassette

Tuner section

FM stereo, FM/AM superheterodyne tuner

FM tuner section

Tuning range	
North American model:	87.5 - 108.0 MHz (100-kHz step)
Other models:	87.5 - 108.0 MHz (50-kHz step)
Antenna	FM wire antenna
Antenna terminals	75 ohm unbalanced
Intermediate frequency	10.7 MHz

AM tuner section

Tuning range	
North American model:	530 - 1,710 kHz (with the tuning interval set at 10 kHz) 531 - 1,710 kHz (with the tuning interval set at 9 kHz)
European model:	531 - 1,602 kHz (with the tuning interval set at 9 kHz)
Middle Eastern model:	531 - 1,602 kHz (with the tuning interval set at 9 kHz)
Other models:	530 - 1,710 kHz (with the tuning interval set at 10 kHz) 531 - 1,602 kHz (with the tuning interval set at 9 kHz)
Antenna	AM loop antenna, external antenna terminal
Intermediate frequency	450 kHz

General

Power requirements	
North American model:	120 V AC, 60 Hz
European model:	230 V AC, 50/60 Hz
Australian model:	220 - 240 V AC, 50/60 Hz
Mexican model:	120 V AC, 60 Hz
Other models:	110 - 120 V or 220 - 240 V AC , 50/60 Hz Adjustable with voltage selector
Power consumption	70 W
Dimensions (w/h/d)	Approx. 190 × 252 × 310 mm incl. projecting parts and controls
Mass	Approx. 5.6 kg

Design and specifications are subject to change without notice.

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SECTION 1
SERVICING NOTES

NOTES ON HANDLING THE OPTICAL PICK-UP BLOCK OR BASE UNIT

The laser diode in the optical pick-up block may suffer electrostatic break-down because of the potential difference generated by the charged electrostatic load, etc. on clothing and the human body.
During repair, pay attention to electrostatic break-down and also use the procedure in the printed matter which is included in the repair parts.
The flexible board is easily damaged and should be handled with care.

NOTES ON LASER DIODE EMISSION CHECK

The laser beam on this model is concentrated so as to be focused on the disc reflective surface by the objective lens in the optical pick-up block. Therefore, when checking the laser diode emission, observe from more than 30 cm away from the objective lens.

Notes on chip component replacement

- Never reuse a disconnected chip component.
- Notice that the minus side of a tantalum capacitor may be damaged by heat.

Flexible Circuit Board Repairing

- Keep the temperature of the soldering iron around 270 ˚C during repairing.
- Do not touch the soldering iron on the same conductor of the circuit board (within 3 times).
- Be careful not to apply force on the conductor when soldering or unsoldering.

CAUTION
Use of controls or adjustments or performance of procedures other than those specified herein may result in hazardous radiation exposure.

This appliance is classified as a CLASS 1 LASER product.
The CLASS 1 LASER PRODUCT MARKING is located on the rear exterior.

Laser component in this product is capable of emitting radiation exceeding the limit for Class 1.

The following caution label is located inside the unit.

CAUTION : INVISIBLE LASER RADIATION WHEN OPEN AND INTERLOCKS DEFEATED. AVOID EXPOSURE TO BEAM.
ADVARSEL : USYNLIG LASERSTRÅLING VED ÅBNING NÅR SIKKERHEDSAFBRYDERE ER UDE AF FUNKTION. UNDGÅ UDSAETTELSE FOR STRÅLING.
VORSICHT : UNSICHTBARE LASERSTRAHLUNG, WENN ABDECKUNG GEÖFFNET UND SICHERUEITSVERRIEGELUNG ÜBERBRÜCKT. NICHT DEM STRAHL AUSSETZEN.
VARO! : AVATTAESSA JA SUOJALUKITUS OHITETTAESSA OLET ALTTIINA NÄKYMÄTTÖMÄLLE LASERSÄTEILYLLE. ÄLÄ KATSO SÄTEESEEN.
VARNING : OSYNLING LASERSTRÅLING NÄR DENNA DEL ÄR ÖPPNAD OCH SPÄRREN ÄR URKOPPLAD. BETRAKTA EJ STRÅLEN.
ADVERSEL : USYNLIG LASERSTRÅLING NÅR DEKSEL ÅPNES OG SIKKERHEDSLÅS BRYTES. UNNGÅ EKSPONERING FOR STRÅLEN.
VIGYAZAT! : A BURKOLAT NYITÁSAKOR LÁTHATATLAN LÉZERSUGÁRVESZÉLY! KERÜLJE A BESUGÁRZÁST!

SAFETY-RELATED COMPONENT WARNING!!

COMPONENTS IDENTIFIED BY MARK ⚠ OR DOTTED LINE WITH MARK ⚠ ON THE SCHEMATIC DIAGRAMS AND IN THE PARTS LIST ARE CRITICAL TO SAFE OPERATION. REPLACE THESE COMPONENTS WITH SONY PARTS WHOSE PART NUMBERS APPEAR AS SHOWN IN THIS MANUAL OR IN SUPPLEMENTS PUBLISHED BY SONY.

ATTENTION AU COMPOSANT AYANT RAPPORT À LA SÉCURITÉ!

LES COMPOSANTS IDENTIFÉS PAR UNE MARQUE ⚠ SUR LES DIAGRAMMES SCHÉMATIQUES ET LA LISTE DES PIÈCES SONT CRITIQUES POUR LA SÉCURITÉ DE FONCTIONNEMENT. NE REMPLACER CES COMPOSANTS QUE PAR DES PIÈSES SONY DONT LES NUMÉROS SONT DONNÉS DANS CE MANUEL OU DANS LES SUPPÉMENTS PUBLIÉS PAR SONY.

SAFETY CHECK-OUT

After correcting the original service problem, perform the following safety checks before releasing the set to the customer: Check the antenna terminals, metal trim, "metallized" knobs, screws, and all other exposed metal parts for AC leakage. Check leakage as described below.

LEAKAGE

The AC leakage from any exposed metal part to earth ground and from all exposed metal parts to any exposed metal part having a return to chassis, must not exceed 0.5 mA (500 microamperes). Leakage current can be measured by any one of three methods.

1. A commercial leakage tester, such as the Simpson 229 or RCA WT-540A. Follow the manufacturers' instructions to use these instruments.

2. A battery-operated AC milliammeter. The Data Precision 245 digital multimeter is suitable for this job.

3. Measuring the voltage drop across a resistor by means of a VOM or battery-operated AC voltmeter. The "limit" indication is 0.75 V, so analog meters must have an accurate low-voltage scale. The Simpson 250 and Sanwa SH-63Trd are examples of a passive VOM that is suitable. Nearly all battery operated digital multimeters that have a 2V AC range are suitable. (See Fig. A)

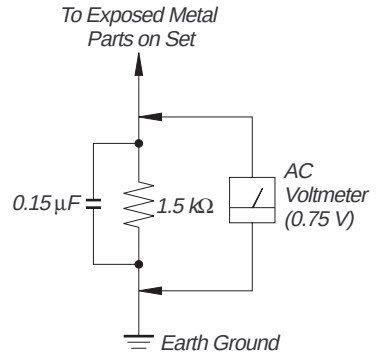
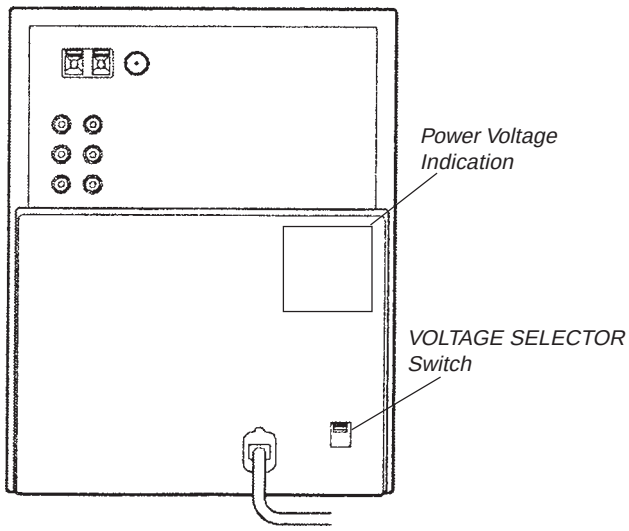


Fig. A. Using an AC voltmeter to check AC leakage.

MODEL IDENTIFICATION
– Back Panel –



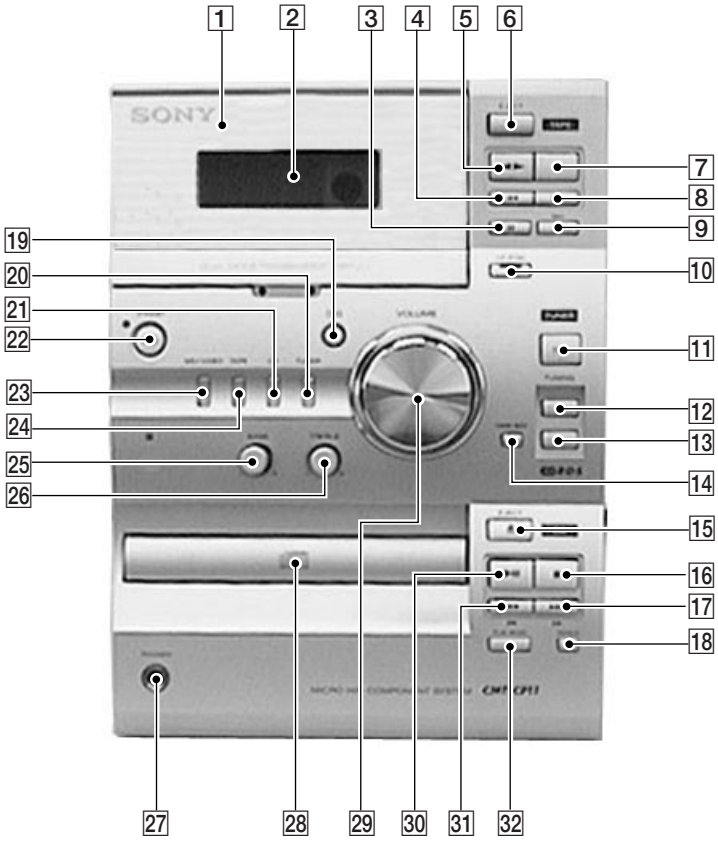
Model	Power Voltage Incdication
US, CND, MX, KR models	AC: 120 V 60 Hz 55 W
AEP, UK, AED, CIS, models	AC: 230 V ∼50 Hz 55 W
E, EA, AR, HK, MY, SP, TW, AUS models	AC: 110 – 120/ 220 – 240 V / 50/60 Hz 55 W

- Abbreviation
  EA : Saudi Arabia model.
  AUS : Australian model.
  SP : Singapore model.
  MY : Malaysia model.
  TW : Taiwan model.
  HK : Hong Kong model.
  AR : Argentine model.
  CND : Canadian model.
  AED : North European model.
  MX : Mexican model.
  KR : Korean model.

SECTION 2
GENERAL

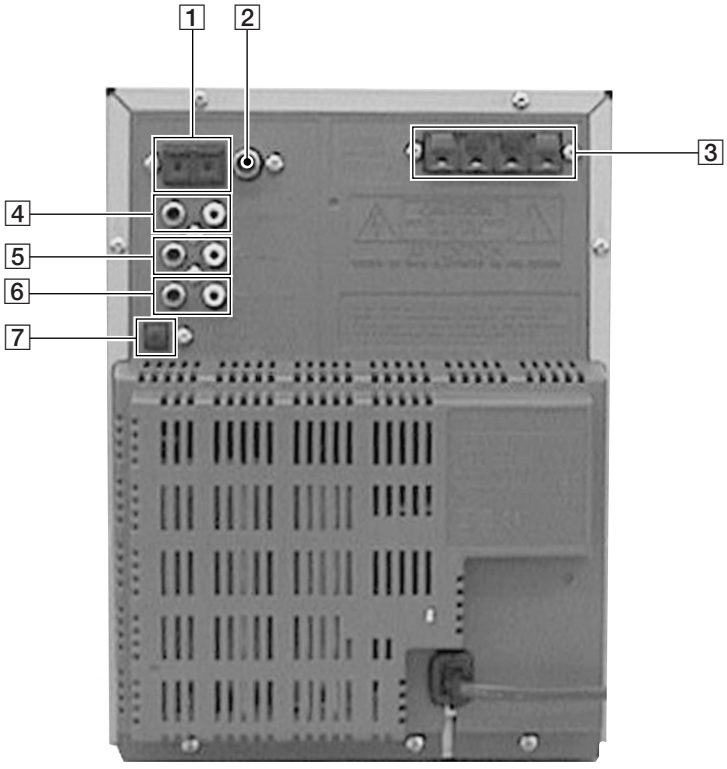
LOCATION OF CONTROLS

• Front View



1 TAPE deck
2 Liquid crystal display
3 TAPE ❚❚ button
4 TAPE ◀◀ button
5 TAPE ◀▶ button
6 TAPE ⏏ button
7 TAPE ■ button
8 TAPE ▶▶ button
9 TAPE REC ● button
10 CD SYNC button and indicator
11 BAND button
12 TUNING + button
13 TUNING – button
14 TUNING MODE button
15 CD EJECT ⏏ button
16 CD ■ button
17 CD ▶▶I ▶▶ button
18 CD REPEAT button
19 DSG button and indicator
20 STANDBY I/⏻ button and indicator
21 MD/VIDEO button and indicator
22 TAPE button and indicator
23 CD button and indicator
24 TUNER button and indicator
25 Remote sensor
26 jack
27 PHONES jack
28 CD disc tray
29 VOLUME knob
30 CD ▶❚❚ button
31 CD I◀◀ ◀◀ button
32 CD PLAY MODE button

• Rear View



1 AM ANTENNA terminals
2 FM ANTENNA jack or terminals
3 SPEAKER terminals
4 LINE OUT jacks
5 MD IN jacks
6 VIDEO IN jacks
7 CD DIGITAL OUT OPTICAL connector

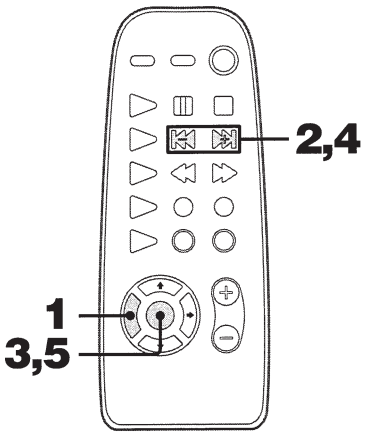
This section is extracted from instruction manual.

Step 2: Setting the time

Before you can use the system's timer functions, set the internal clock.

The clock uses a 24-hour system on the European model, and a 12-hour system on other models.

The 24-hour system is used here for illustration purposes.

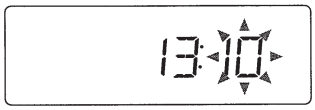


1 Press TIMER SET.
The hour indication flashes.

2 Press ⏮/⏭ repeatedly to set the hour.

3 Press ENTER.
The minute indication flashes.

4 Press ⏮/⏭ repeatedly to set the minute.



5 Press ENTER.
The clock will begin operating.

To reset the system clock

You can reset the system clock even when the system is on or off.

1 Press TIMER SET.
2 Press ⏮/⏭ repeatedly until "SET CLOCK" appears, then press ENTER.
3 Repeat step 2 to 5 in "Step 2: Setting the time".

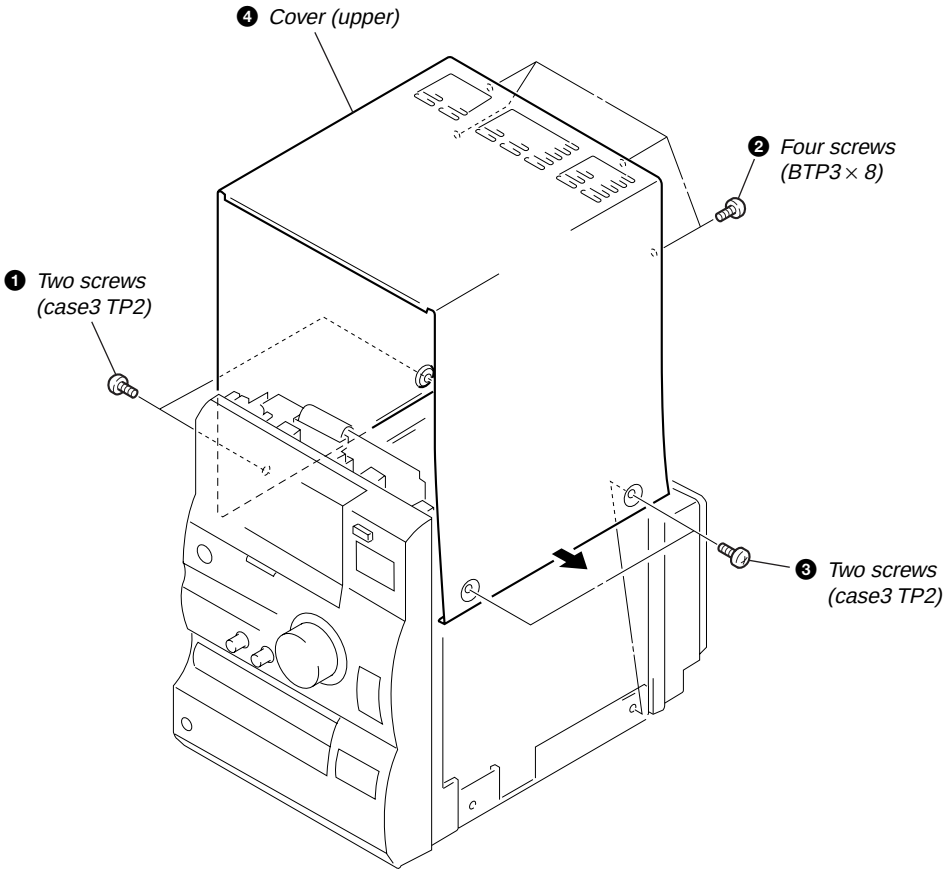
Tip

If you make a mistake, start over from step 1.

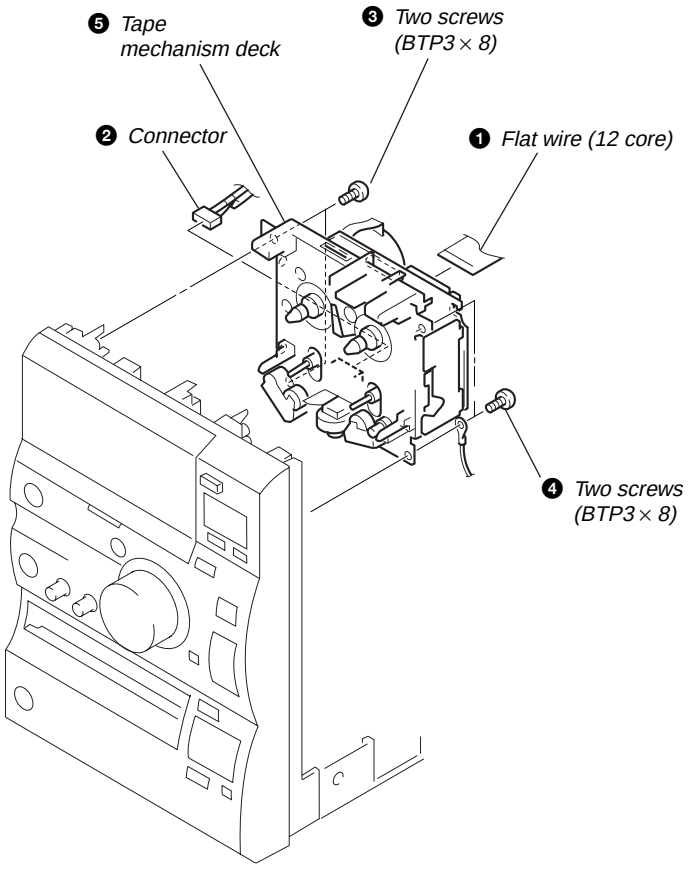
SECTION 3
DISASSEMBLY

Note: Follow the disassembly procedure in the numerical order given.

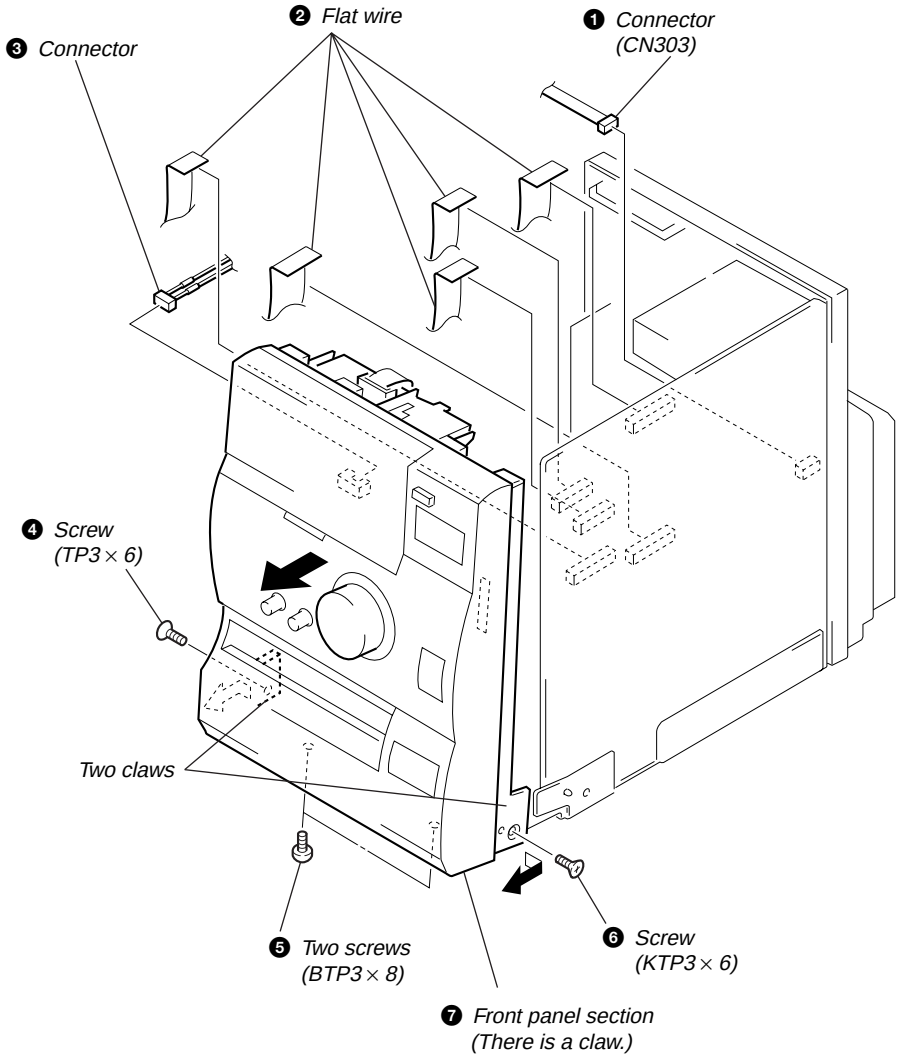
3-1. COVER (UPPER)



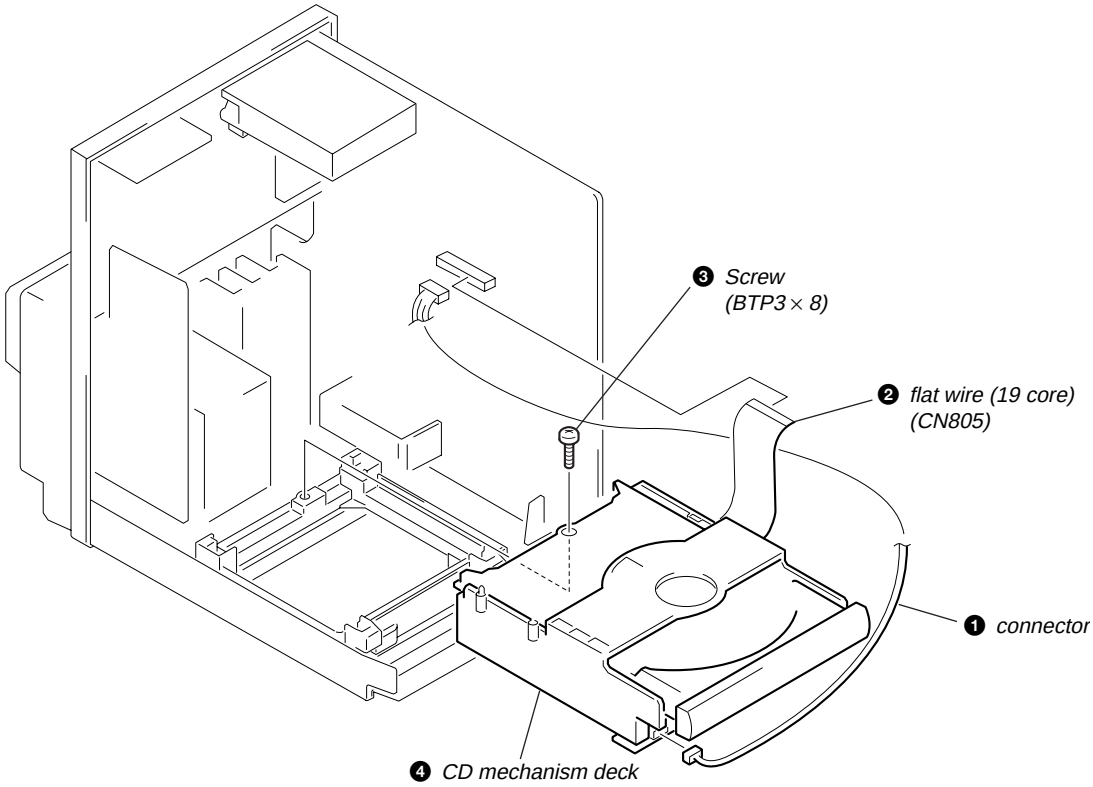
3-2. TAPE MECHANISM DECK



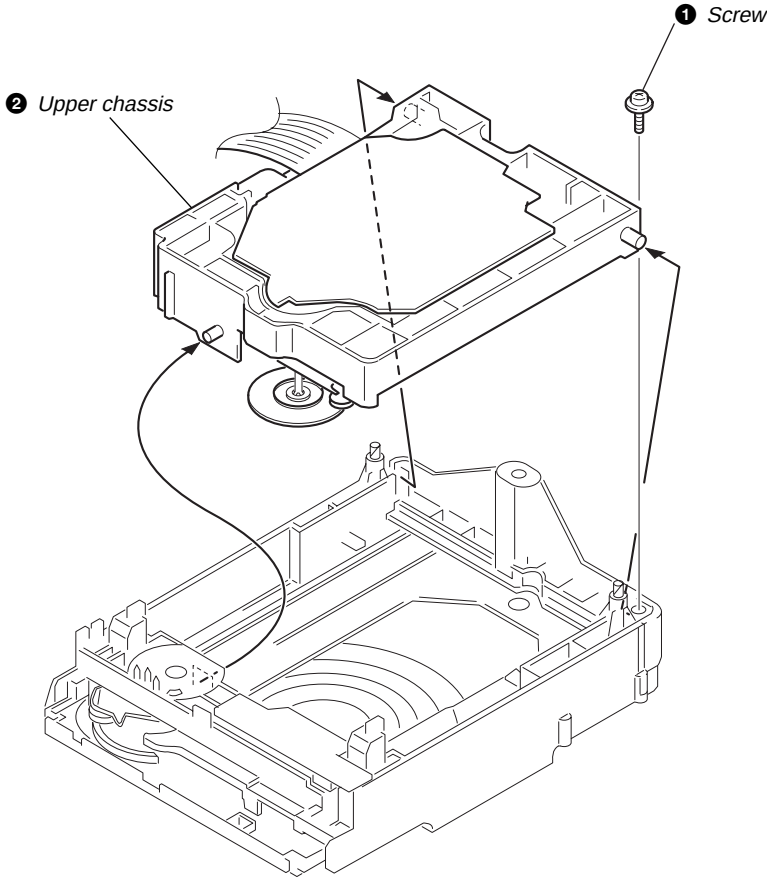
3-3. FRONT PAENL SECTION



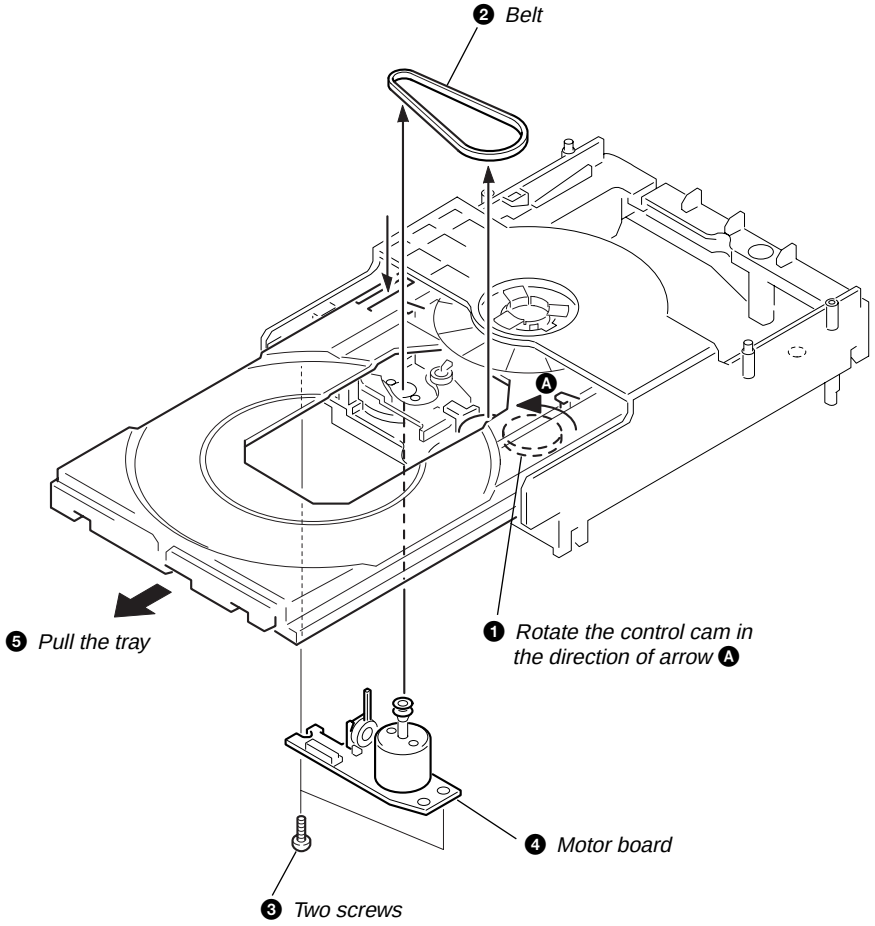
3-4. CD MECHANISM DECK



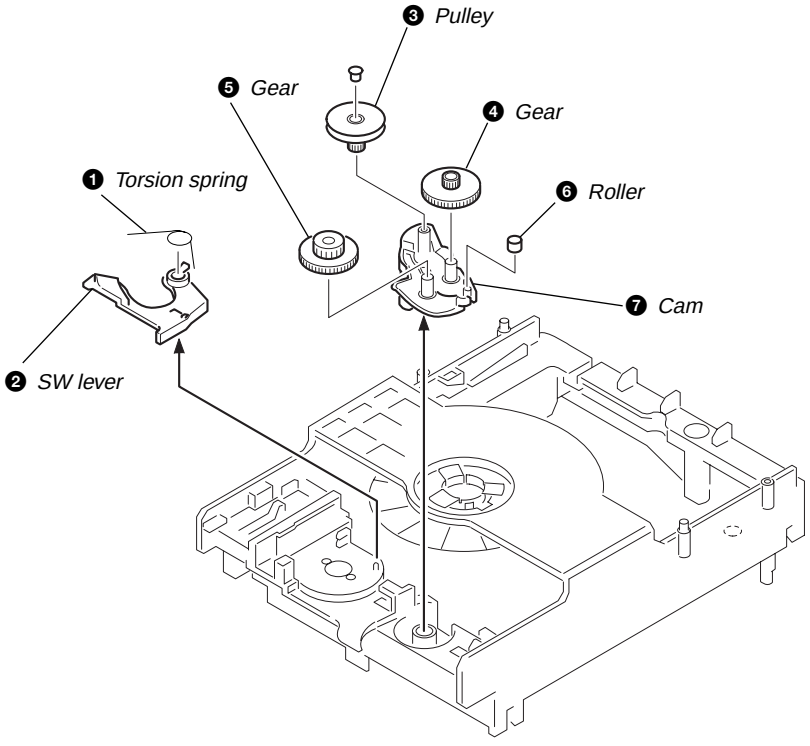
3-5. UPPER CHASSIS



3-6. TRAY



3-7. CAM



SECTION 4
SERVICE MODE

[Liquid Crystal Display All Lit Check Mode]

Procedure:

1. Set to standby state.
2. Press three buttons of ■ (TAPE), ■ (CD), and MD/VIDEO simultaneously.
3. Liquid crystal display are all turned on.
4. To exit from this mode, press the I/⏻ button to turn the power OFF.

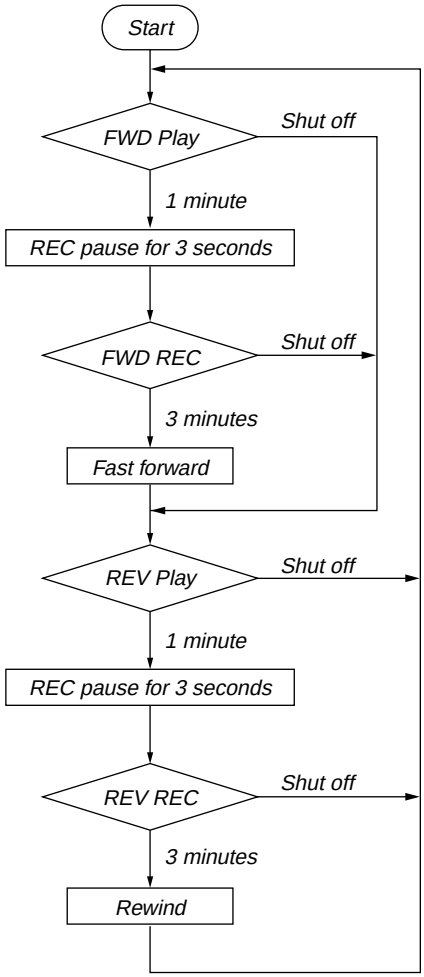
[Tape Deck Aging Mode]

This mode can be used for operation check of tape deck section.

Procedure:

1. Set a tape in the tape deck.
2. Set to standby state.
3. Press three buttons of ■ (TAPE), ■ (CD), and TAPE simultaneously.
4. The aging is executed in bellow sequence.
5. To exit from the aging mode, press the I/⏻ button to turn the power OFF.

Aging mode sequence:



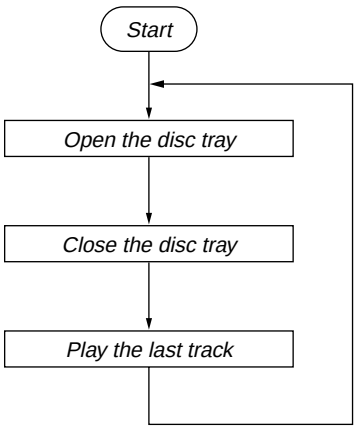
[CD Aging Mode]

This mode can be used for operation check of CD section.

Procedure:

1. Load a CD disc.
2. Set to standby state.
3. Press three buttons of ■ (TAPE), ■ (CD), and TUNER simultaneously.
4. The aging is executed in bellow sequence.
5. To exit from the aging mode, press the I/⏻ button to turn the power OFF.

Aging mode sequence:



SECTION 5
ELECTRICAL CONFIRMATIONS AND ADJUSTMENTS

DECK SECTION | 0 dB=0.775 V

Note: Confirm each contents of this section first of all. If the results are not satisfied, do the adjustment.

1. Demagnetize the record/playback head with a head demagnetizer.
2. Do not use a magnetized screwdriver for the adjustments.
3. After the adjustments, apply suitable locking compound to the parts adjust.
4. The adjustments should be performed with the rated power supply voltage unless otherwise noted.
5. The adjustments should be performed in the order given in this service manual. (As a general rule, playback circuit adjustment should be completed before performing recording circuit adjustment.)
6. The adjustments should be performed for both L-CH and R-CH.
7. Switches and controls should be set as follows unless otherwise specified.

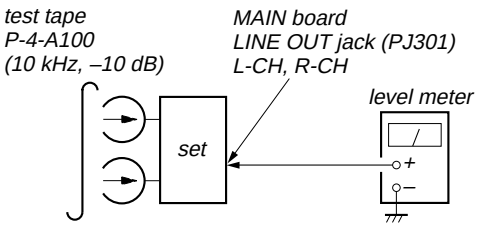
• Test Tape

Tape	Signal	Used for
P-4-A100	10 kHz, –10 dB	Azimuth Adjustment
WS-48B	3 kHz, 0 dB	Tape Speed Adjustment
P-4-L300	315 Hz, 0 dB	Level Adjustment

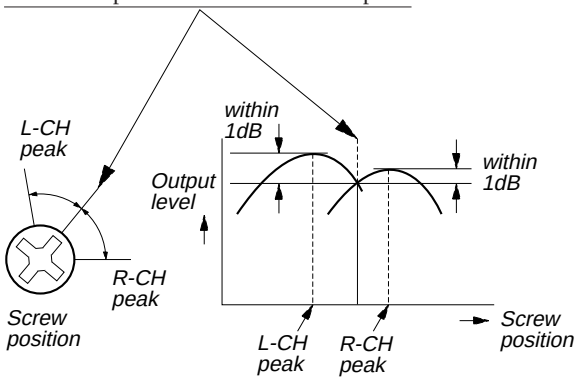
Record/Playback Head Azimuth Adjustment

Procedure:

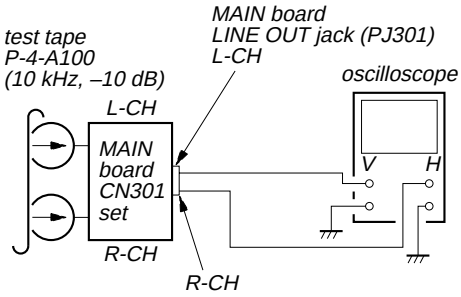
1. Mode: Playback

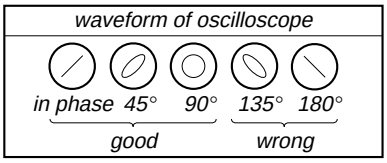


2. Turn the adjustment screw and check output peaks. If the peaks do not match for L-CH and R-CH, turn the adjustment screw so that outputs match within 1dB of peak.



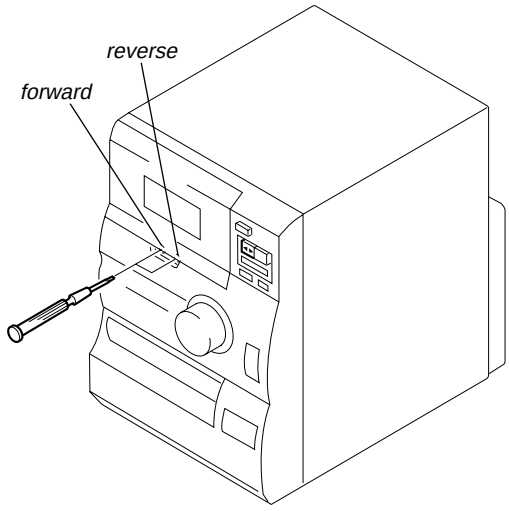
3. Mode: Playback





4. Repeat step 1 to 3 in playback (REV) mode.
5. After the adjustments, apply suitable locking compound to the pats adjusted.

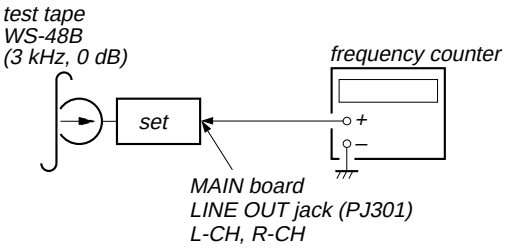
Adjustment Location:



Playback level Confirmation and Adjustment

Procedure:

Mode: Playback



Confirm playback level is within specification values as follows. If these levels are out of specification values, adjust the RV151 (L-CH) and RV251 (R-CH) on the MAIN board so that the level meter reading become within specification values.

Specification values:

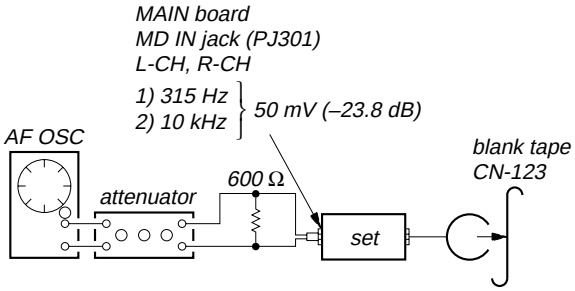
PJ301 PB level: 301.5 to 338.3 mV (–8.2 to –7.2 dB) level difference between the channels: within ±0.5 dB

Adjustment Location: MAIN board

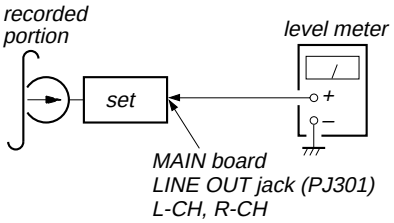
REC Bias Confirmation and Adjustment

Procedure:

1. Mode: Record



2. Mode: Playback



3. Confirm playback the signal recorded in step 1 become specification values as follows.
   If these values are out of specification values, adjust the RV153 (L-CH) and RV253 (R-CH) on the MAIN board to repeat steps 1and 2.

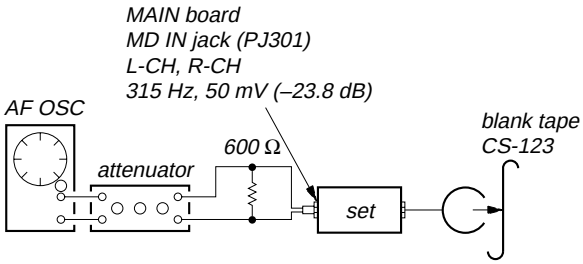
Specification values: Playback output of 315 Hz to playback output of 10 kHz: ± 0.5 dB

Adjustment Location: MAIN board

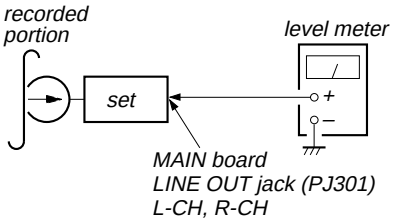
REC Level Confirmation and Adjustment

Procedure:

1. Mode: Record



2. Mode: Playback



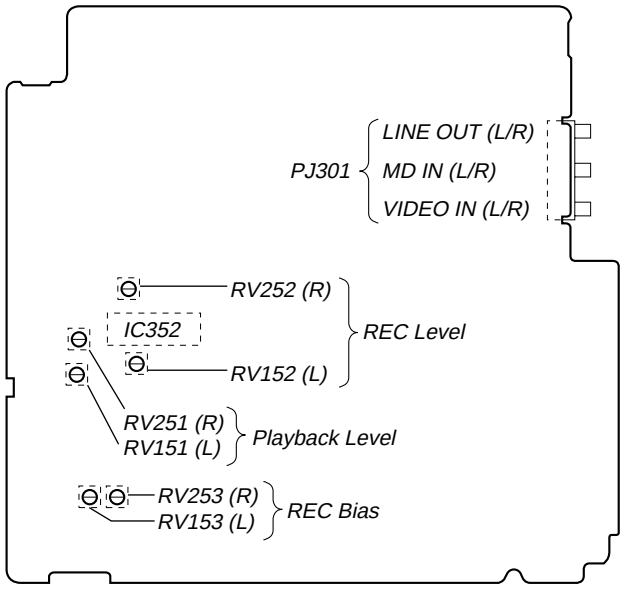
3. Confirm playback the signal recorded in step 1 become specification values as follows.
   If these values are out of specification values, adjust the RV252 (R-CH) and RV152 (L-CH) on the MAIN board to repeat steps 1 and 2.

Specification values:

PJ301 PB level: 47.2 to 53.0 mV (– 24.3 to – 23.3 dB)

Adjustment Location: MAIN board

– MAIN BOARD (Conductor Side) **–**



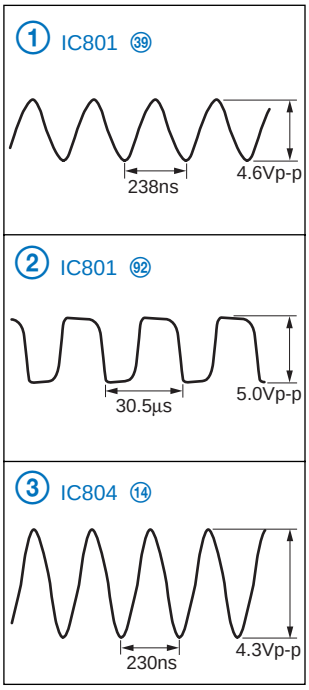
SECTION 6
DIAGRAMS

NOTE FOR PRINTED WIRING BOARDS AND SCHEMATIC DIAGARAMS

Note on Printed Wiring Board:

- ○——— : parts extracted from the component side.
- ——— : parts extracted from the conductor side.
- ▒▒▒ : Pattern from the side which enables seeing.

• Waveforms
– MAIN Board –



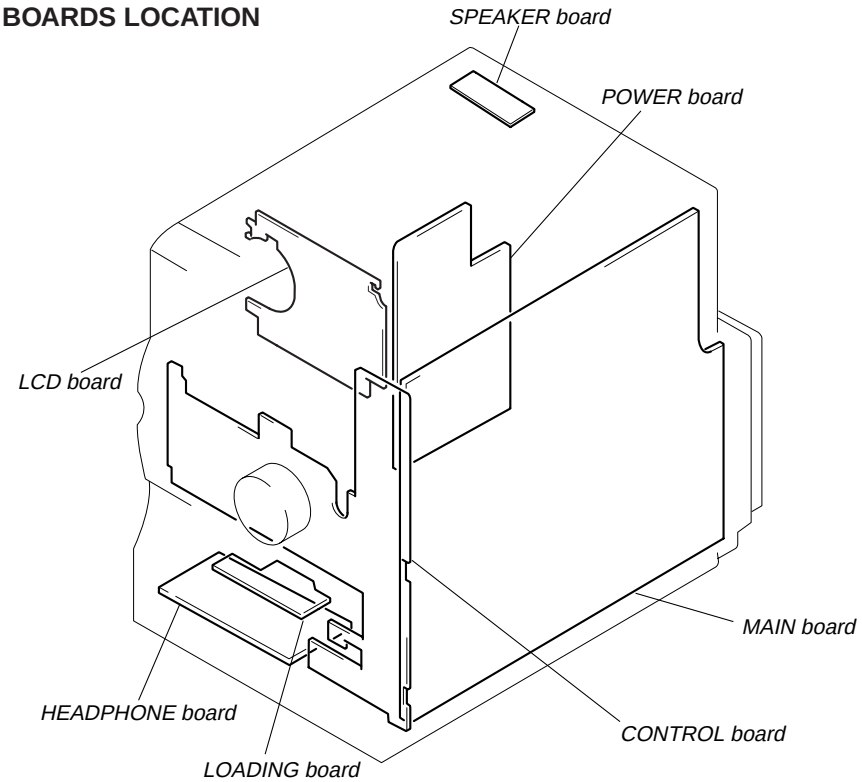
Note on Schematic Diagram:

- All capacitors are in µF unless otherwise noted. pF: µµF 50 WV or less are not indicated except for electrolytics and tantalums.
- All resistors are in Ω and 1/4 W or less unless otherwise specified.
- △ : internal component.
- ▭ : panel designation.

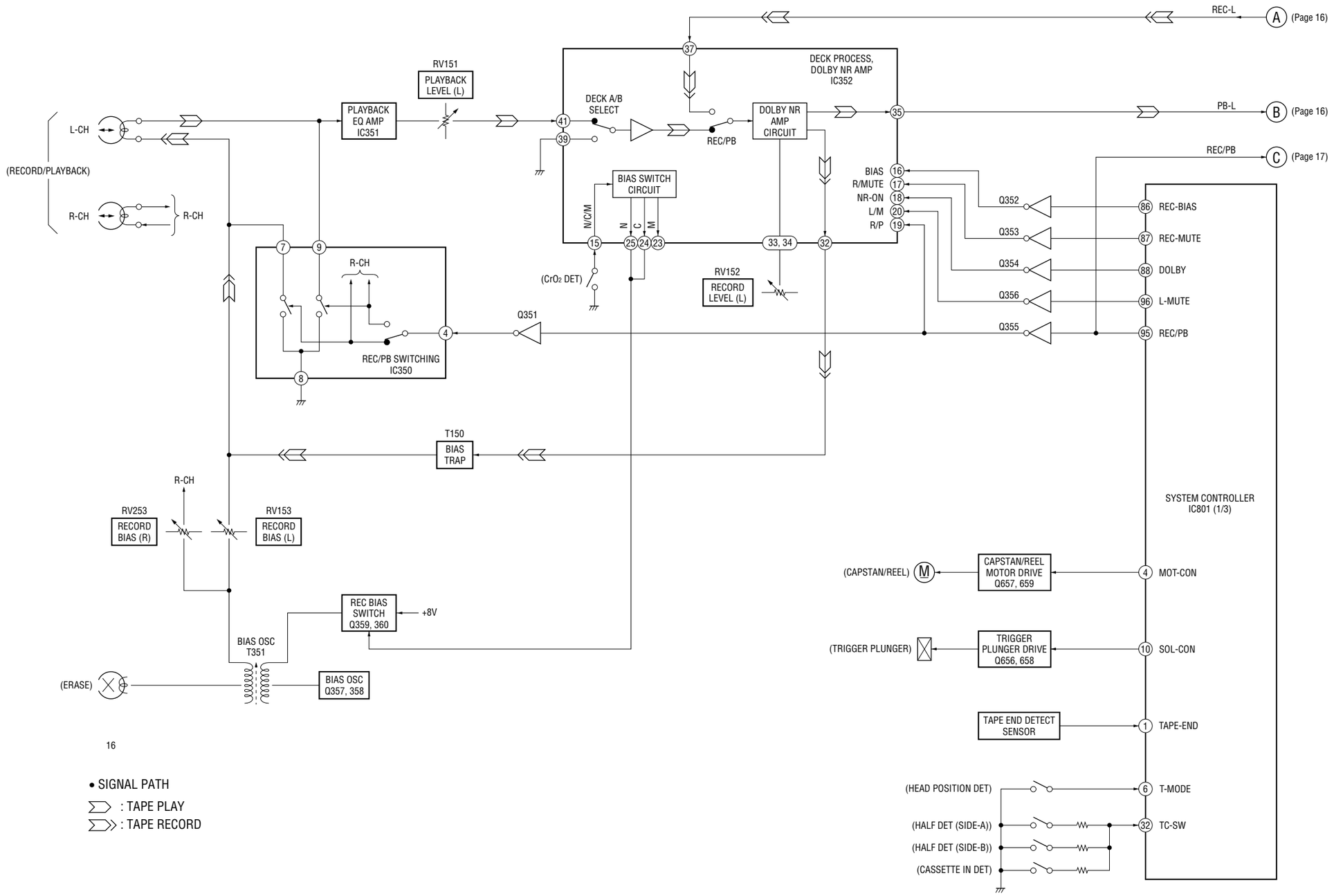
Note:	**Note:**
The components identified by mark ⚠ or dotted line with mark ⚠ are critical for safety. Replace only with part number specified.	Les composants identifiés par une marque ⚠ sont critiques pour la sécurité. Ne les remplacer que par une piéce portant le numéro spécifié.

- B+ : B+ Line.
- B− : B– Line.
- ▭ : adjustment for repair.
- Voltages are taken with a VOM (Input impedance 10 MΩ). Voltage variations may be noted due to normal production tolerances.
- Waveforms are taken with a oscilloscope. Voltage variations may be noted due to normal production tolerances.
- Circled numbers refer to waveforms.
- Signal path.
  - ⇨ : TUNER
  - ⇨ : TAPE PLAY
  - ⇨ : TAPE RECORD
  - ⇨ : CD PLAY (ANALOG OUT)
  - ⇨ : CD PLAY (OPTICAL OUT)
- Abbreviation
  - EA : Saudi Arabia model.
  - AUS : Australian model.
  - SP : Singapore model.
  - MY : Malaysia model.
  - TW : Taiwan model.
  - HK : Hong Kong model.
  - AR : Argentine model.
  - CND : Canadian model.
  - AED : North European model.
  - MX : Mexican model.
  - KR : Korean model.

6-1. CIRCUIT BOARDS LOCATION



6-2. BLOCK DIAGRAM – TAPE Section –



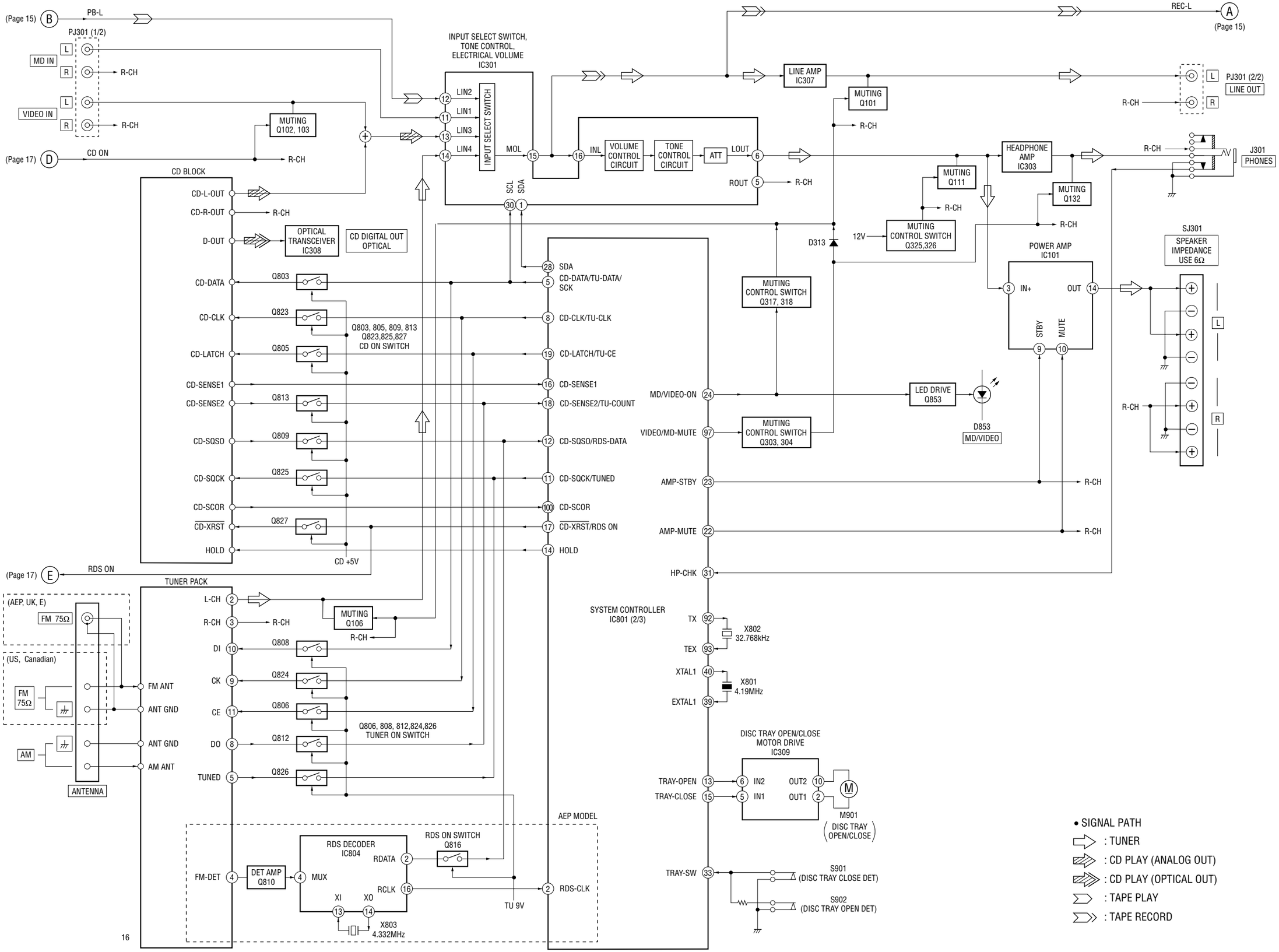
16

• SIGNAL PATH

: TAPE PLAY

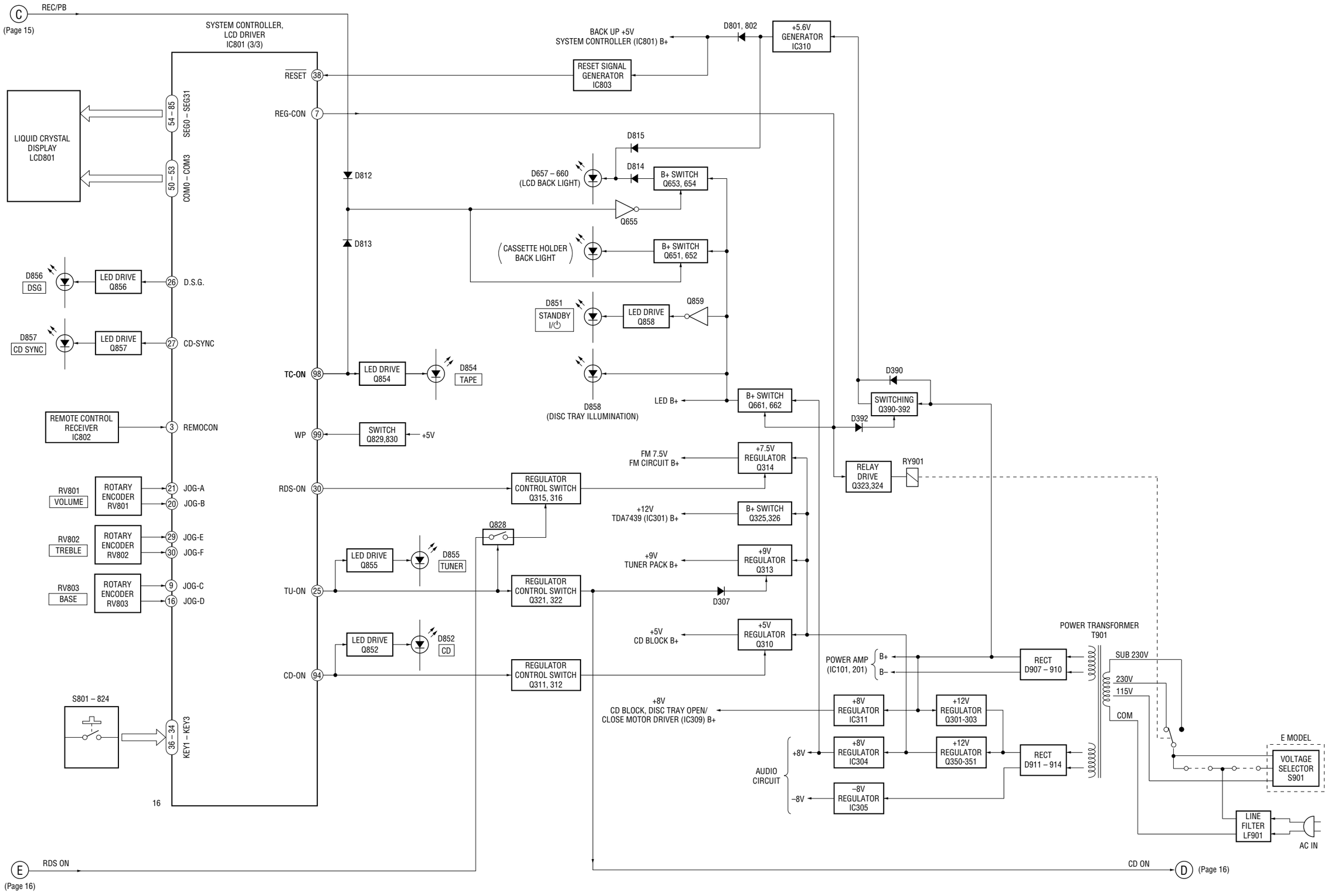
: TAPE RECORD

6-3. BLOCK DIAGRAM – MAIN Section –



16 16

6-4. BLOCK DIAGRAM – DISPLAY/POWER SUPPLY Section –

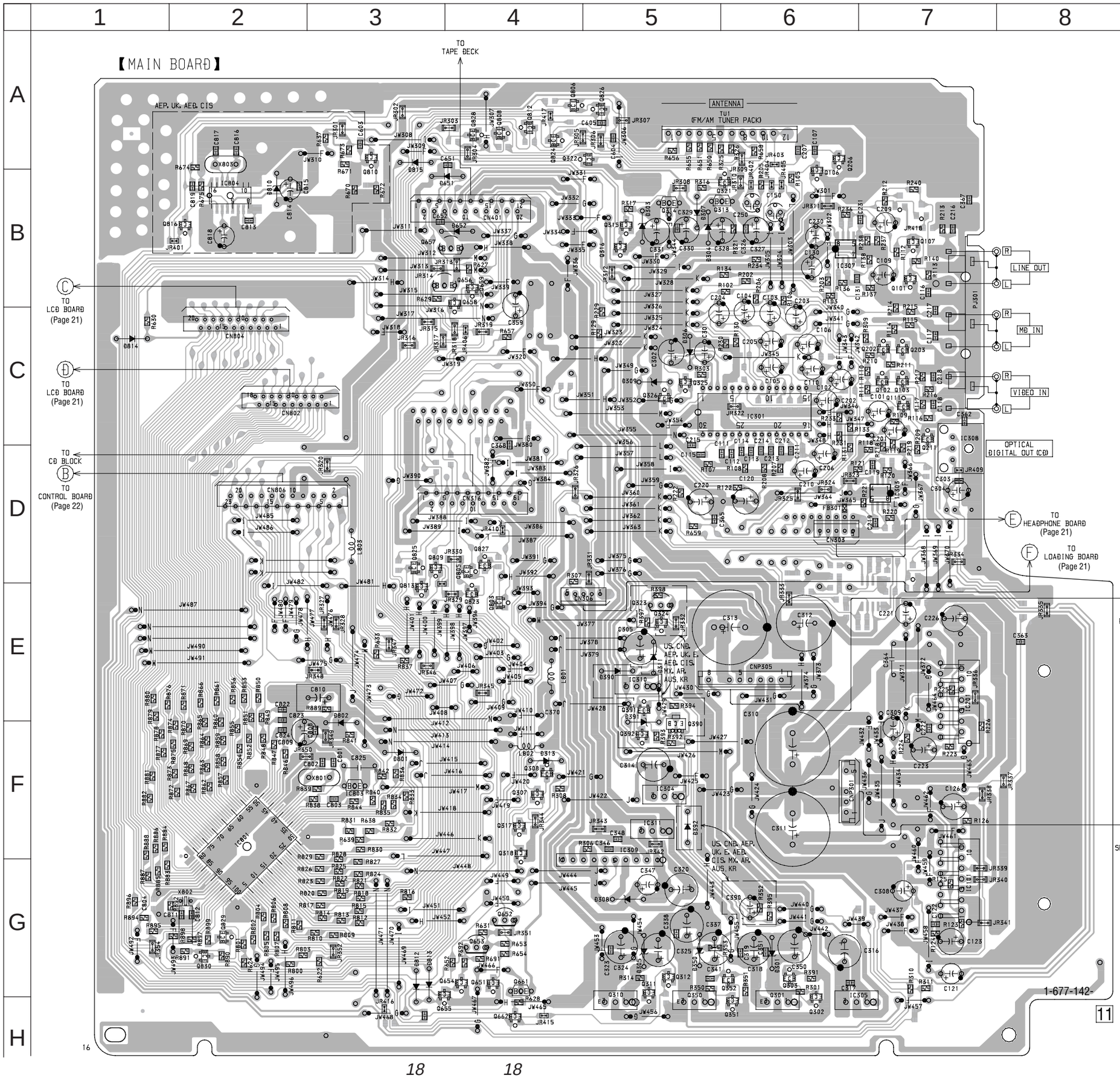


6-5. PRINTED WIRING BOARD – MAIN Section –

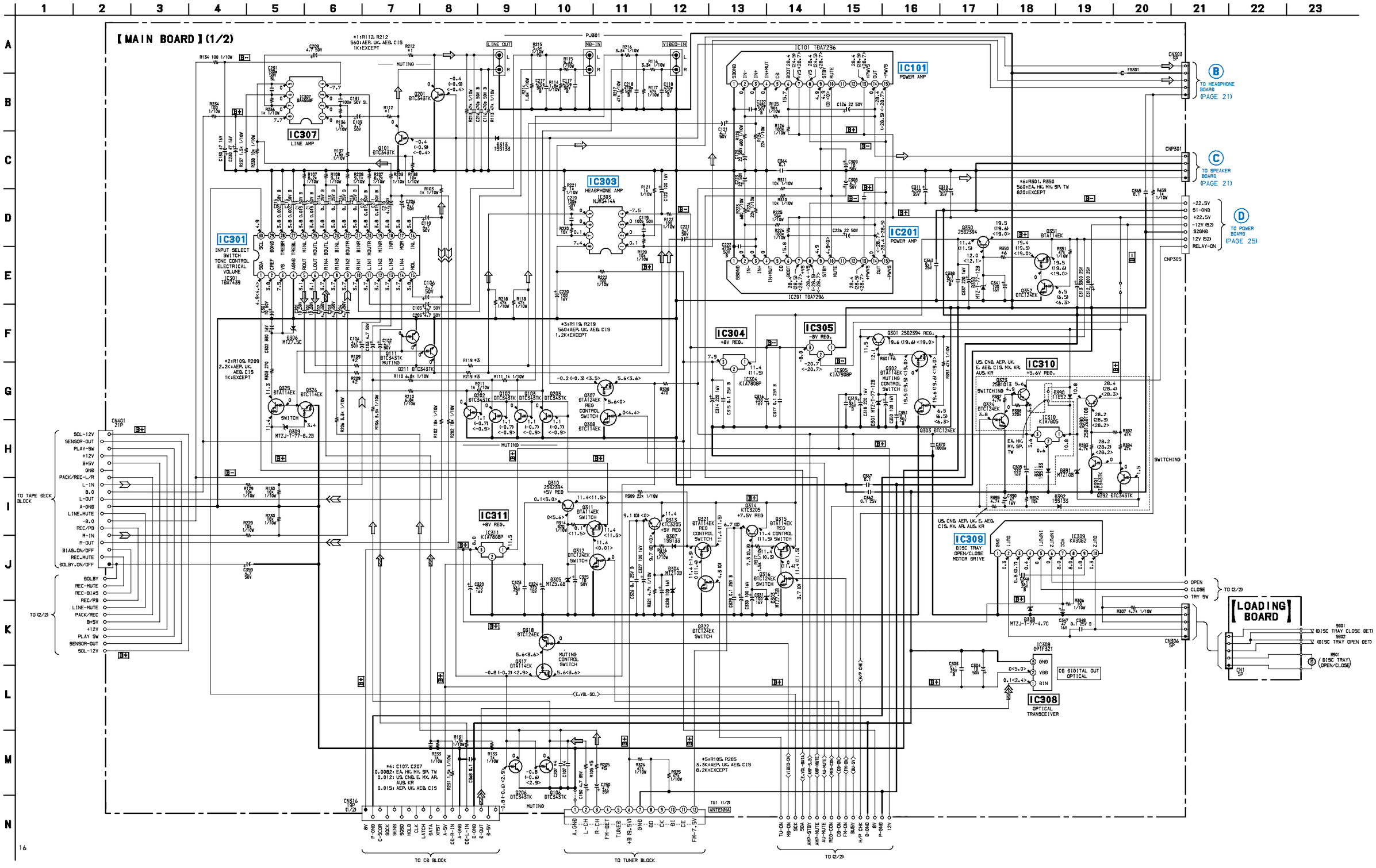
• See page 14 for Circuit Boards Location.

• Semiconductor Location

Ref. No.	Location	Ref. No.	Location
D301	G-6	Q308	F-4
D303	B-5	Q310	G-5
D304	B-5	Q311	G-5
D305	G-5	Q312	G-5
D306	C-5	Q313	A-6
D307	B-5	Q314	B-5
D308	G-5	Q315	B-5
D309	C-5	Q316	B-5
D311	E-5	Q317	F-4
D313	F-4	Q318	F-4
D350	G-5	Q321	B-6
D390	E-5	Q322	A-4
D391	E-5	Q323	D-5
D392	F-5	Q324	D-5
D651	A-3	Q325	C-5
D652	B-4	Q326	C-5
D801	E-3	Q350	G-5
D802	E-3	Q351	G-6
D812	G-3	Q352	G-6
D813	G-4	Q390	E-5
D814	C-1	Q391	E-5
D815	A-3	Q392	E-5
		Q651	G-4
IC101	G-7	Q652	G-4
IC201	E-7	Q653	G-4
IC301	C-6	Q654	G-4
IC303	D-7	Q655	G-4
IC304	F-5	Q656	B-4
IC305	G-6	Q657	B-3
IC307	B-6	Q658	B-4
IC308	D-7	Q659	B-4
IC309	F-5	Q661	G-4
IC310	E-5	Q662	G-4
IC311	F-5	Q803	D-4
IC801	F-2	Q805	D-4
IC803	F-3	Q806	A-4
IC804	B-2	Q808	A-4
		Q809	D-3
Q101	B-7	Q810	A-3
Q102	C-7	Q812	A-4
Q103	C-7	Q813	D-3
Q106	A-6	Q816	B-2
Q111	C-7	Q823	D-4
Q202	C-7	Q824	A-4
Q203	C-7	Q825	D-3
Q206	A-6	Q826	A-5
Q211	C-7	Q827	D-4
Q301	G-6	Q828	A-4
Q302	G-6	Q829	G-2
Q303	G-6	Q830	G-2
Q307	F-4		

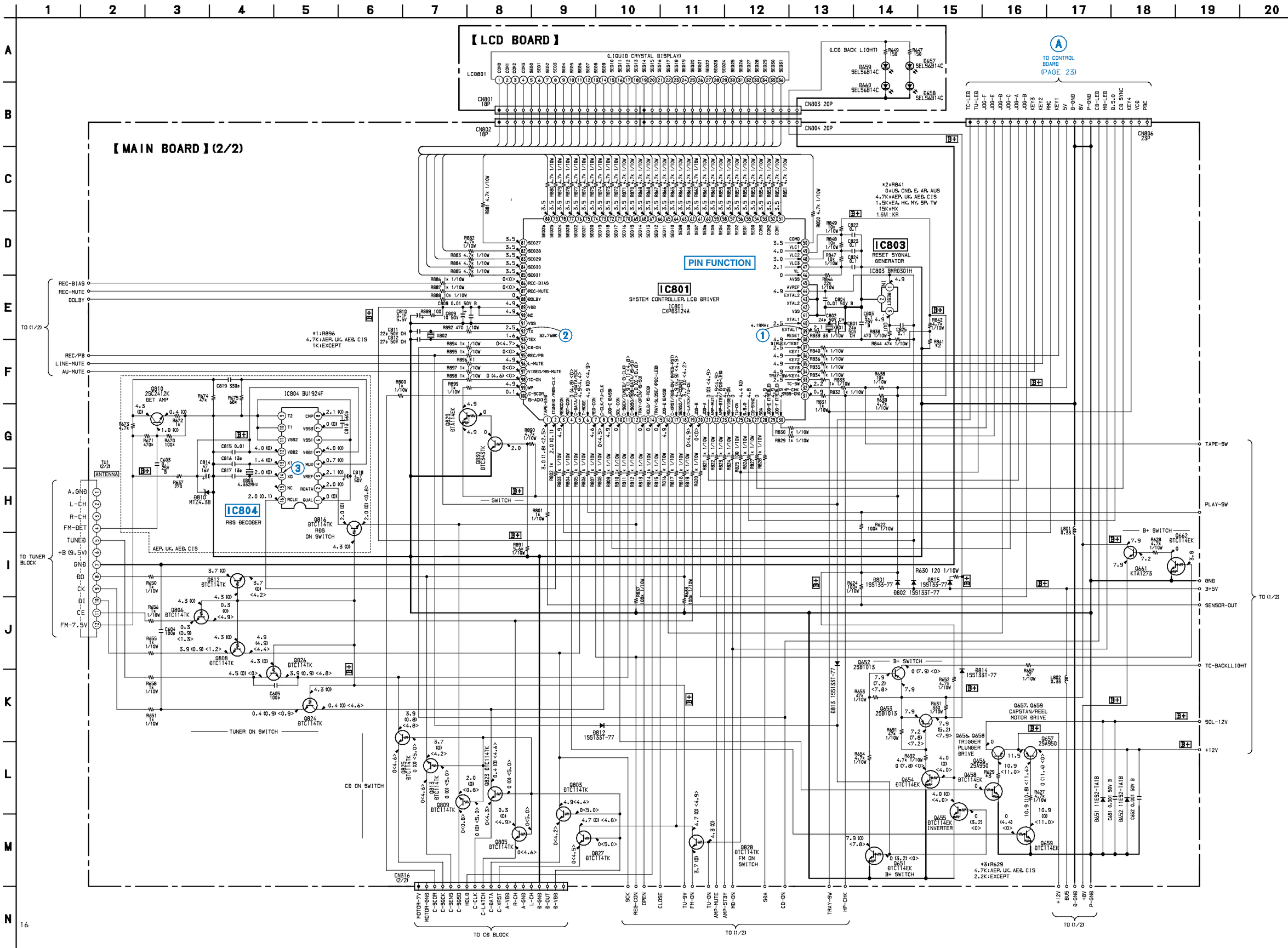


6-6. SCHEMATIC DIAGRAM – MAIN Section (1/2) – • See page 35 for IC Block Diagram.



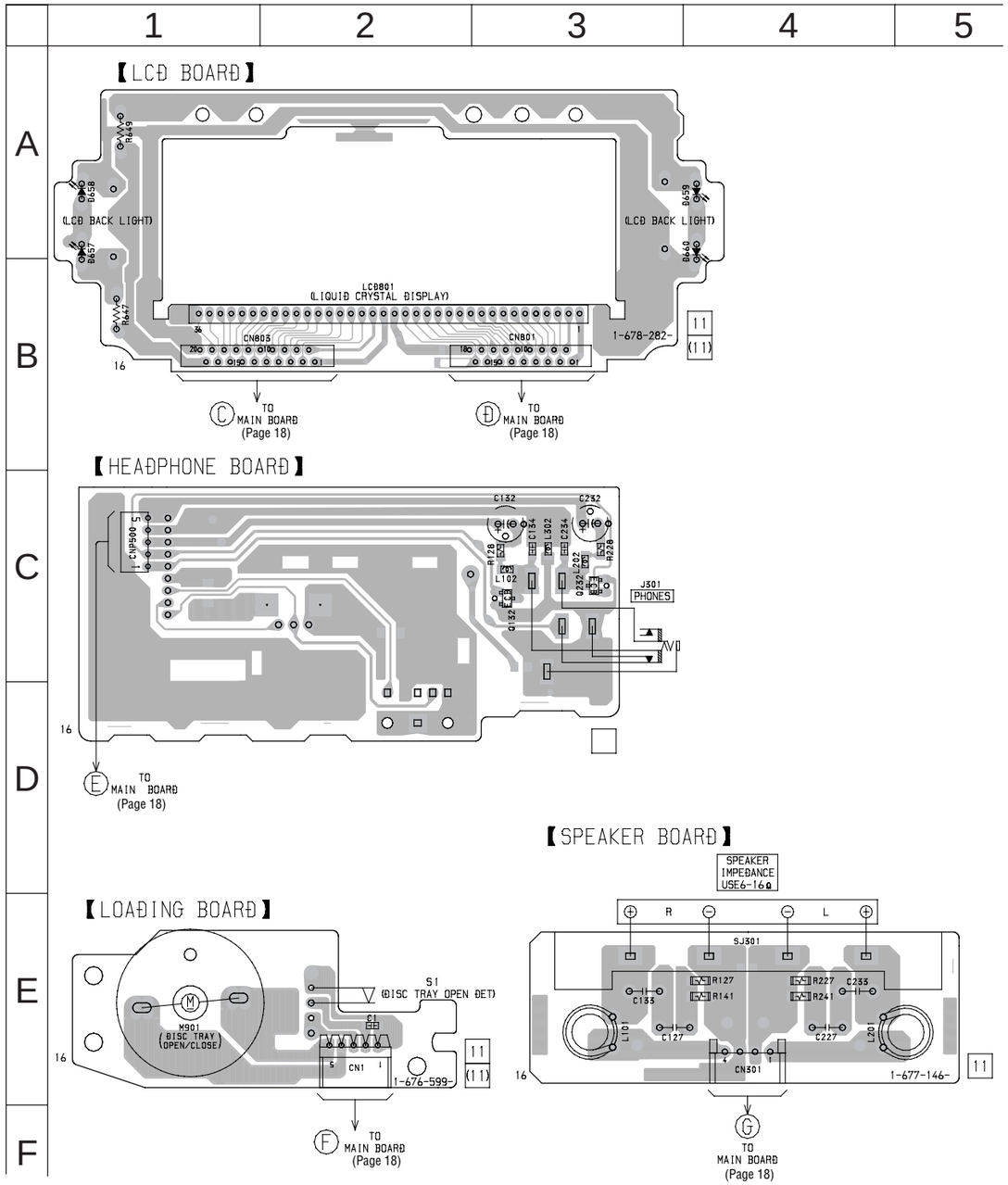
6-7. SCHEMATIC DIAGRAM – MAIN Section (2/2) –

• See page 35 for IC Block Diagrams. • See page 14 for Waveforms.

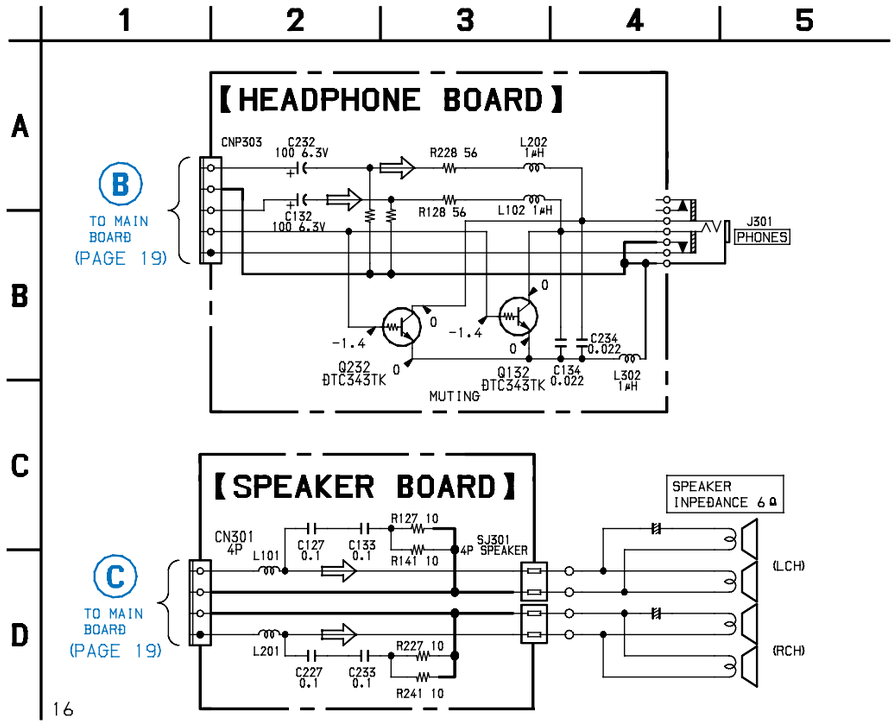


6-8. PRINTED WIRING BOARDS – LCD/HEADPHONE/LOADING/SPEAKER Section –

• See page 14 for Circuit Boards Location.
• See page 20 for LCD BOARD Schematic Diagram.
• See page 19 for LOADING BOARD Schematic Diagram.



6-9. SCHEMATIC DIAGRAMS – HEADPHONE/SPEAKER Section –

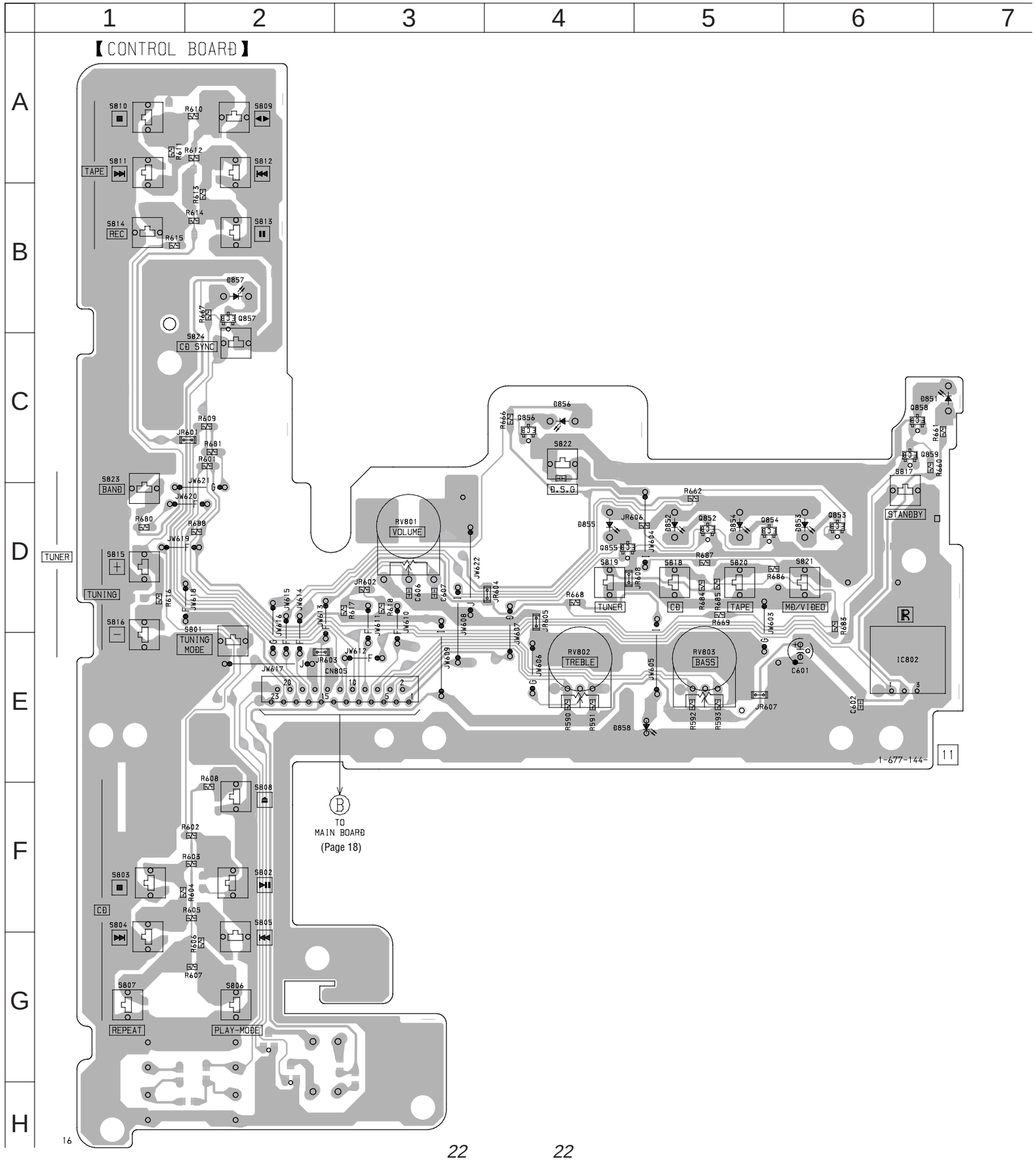


6-10. PRINTED WIRING BOARDS – CONTROL Section –

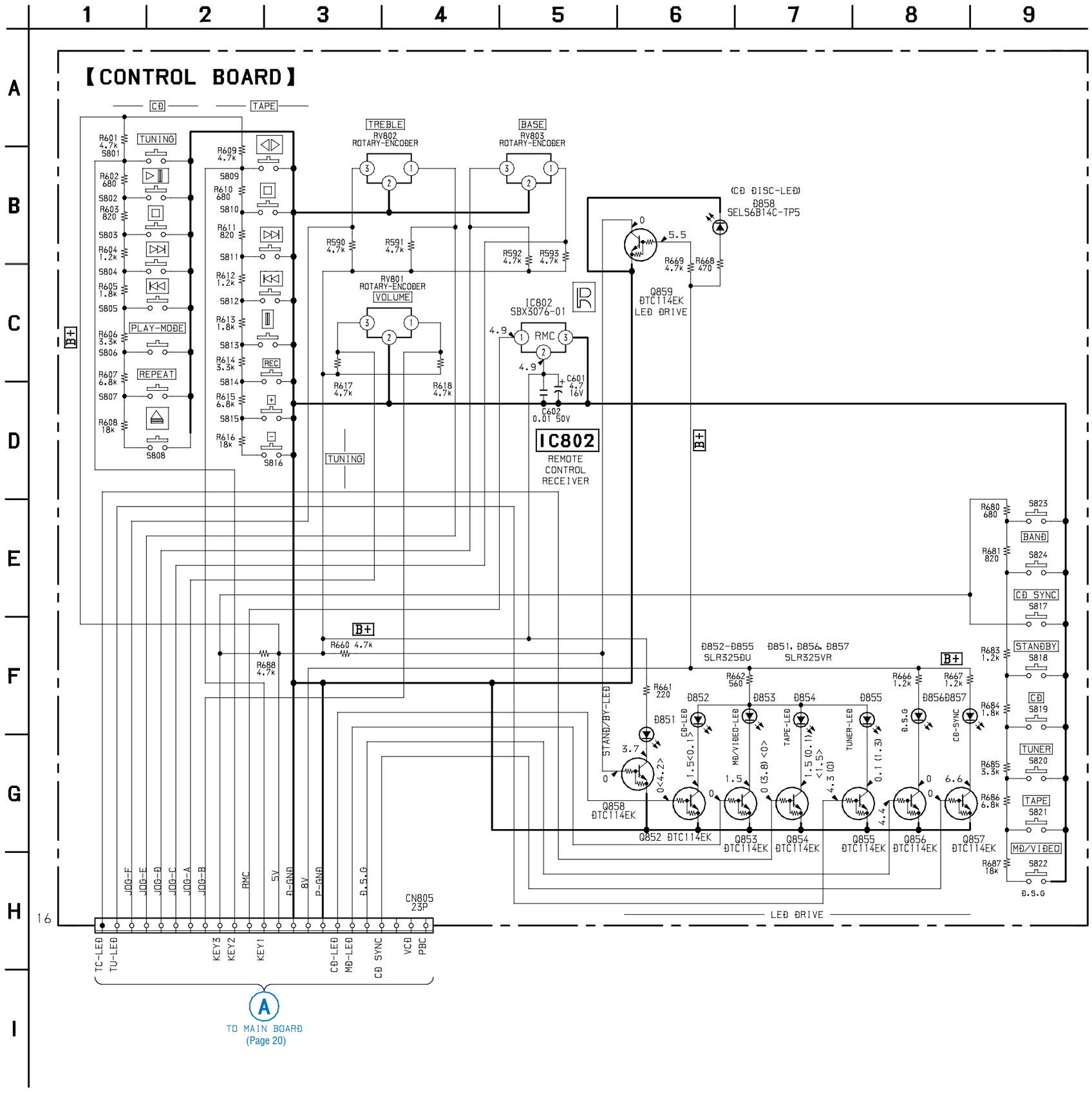
• See page 14 for Circuit Boards Location.

• **Semiconductor Location**

Ref. No.	Location
D851	C-7
D852	D-5
D853	D-6
D854	D-5
D855	D-4
D856	C-4
D857	B-2
D858	E-4
IC802	E-6
Q852	D-5
Q853	D-6
Q854	D-5
Q855	D-4
Q856	C-4
Q857	B-2
Q858	C-6
Q859	C-6



6-11. SCHEMATIC DIAGRAM – PANEL Section –

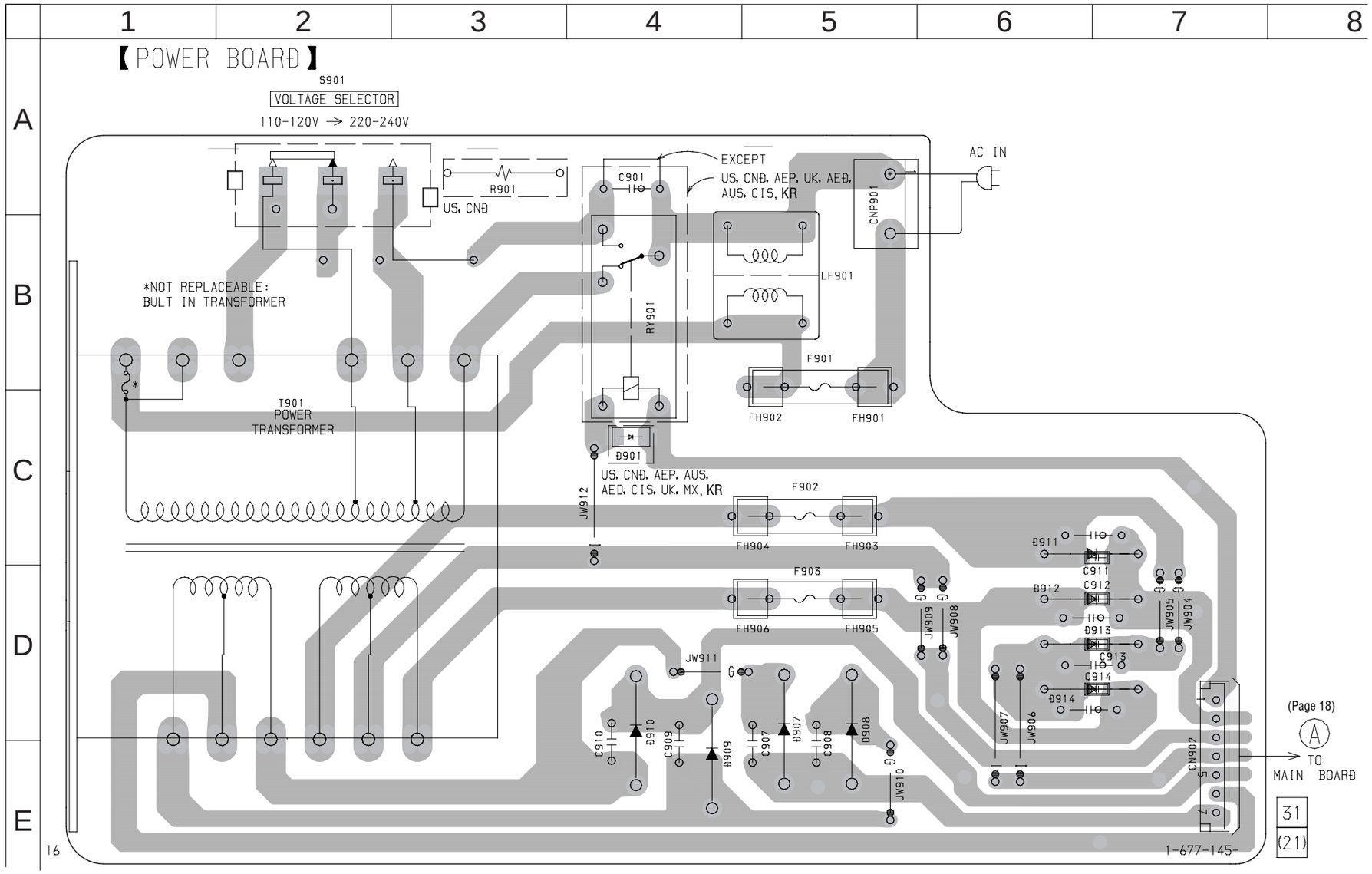


6-12. PRINTED WIRING BOARD – POWER Section –

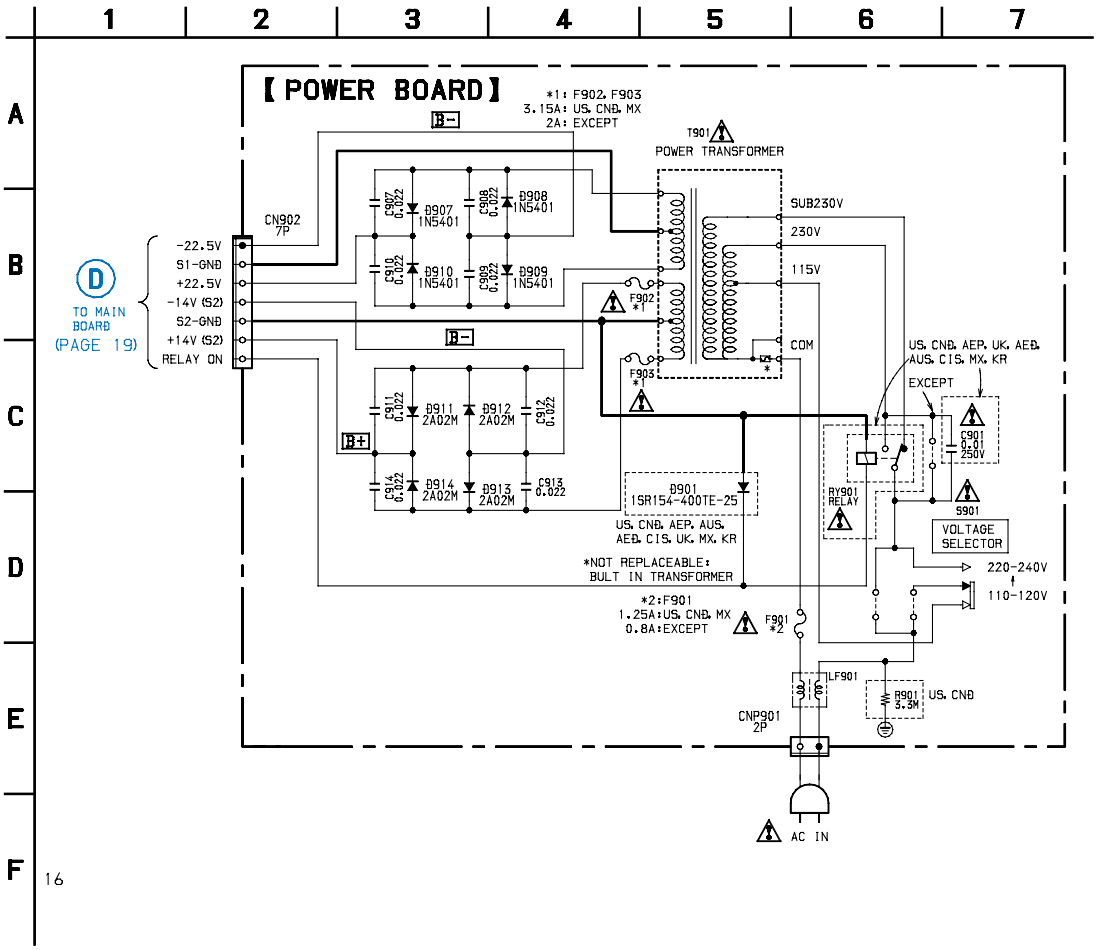
• See page 14 for Circuit Boards Location.

• **Semiconductor Location**

Ref. No.	Location
D901	C-4
D907	D-5
D908	D-5
D909	D-4
D910	D-4
D911	C-6
D912	D-6
D913	D-6
D914	D-6



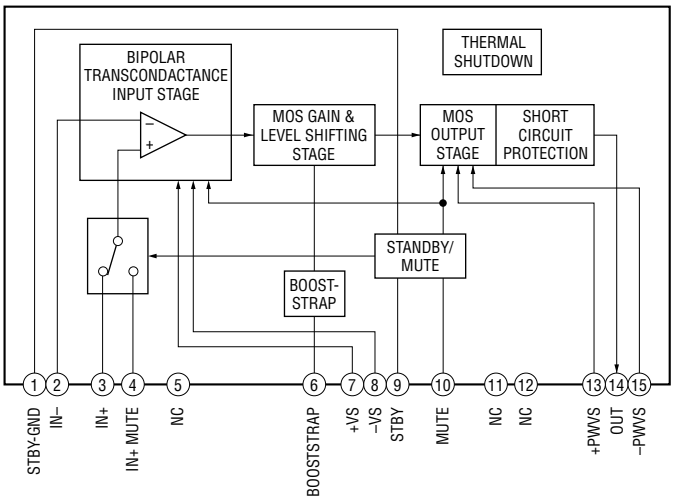
6-13. SCHEMATIC DIAGRAM – POWER Section –



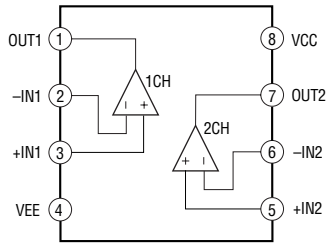
6-14. IC BLOCK DIAGRAMS

– MAIN Board –

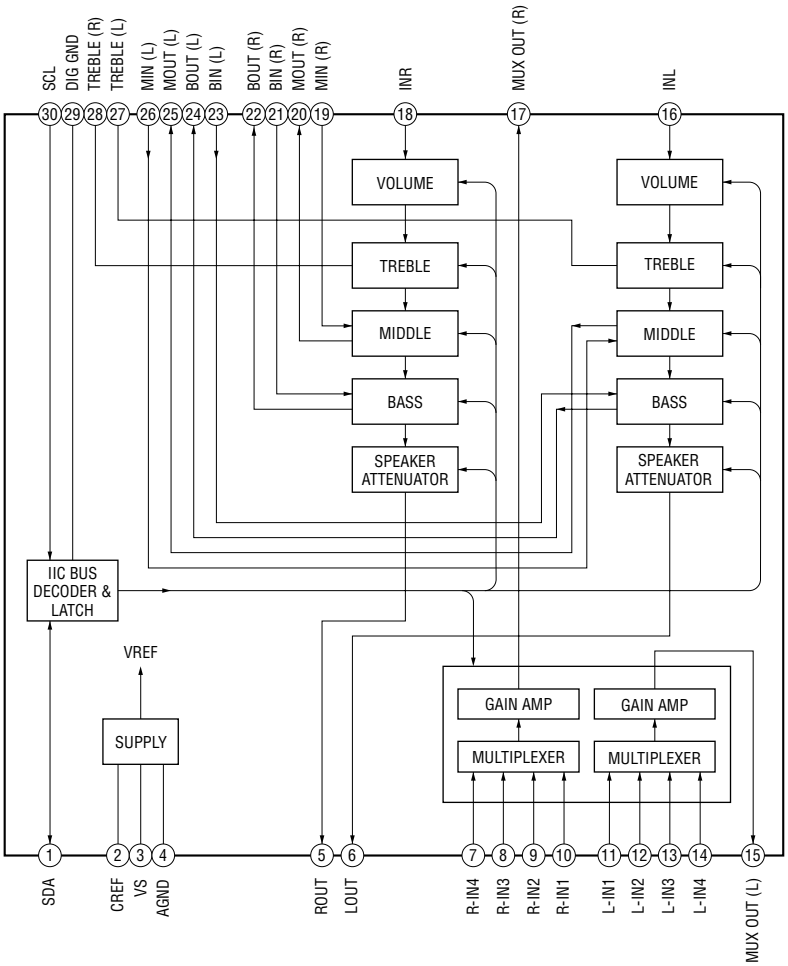
IC101, 201 TDA7296



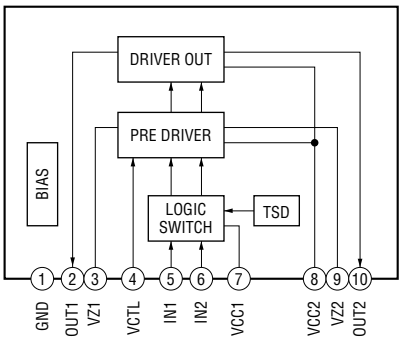
IC303 NJM3414AM-TE2



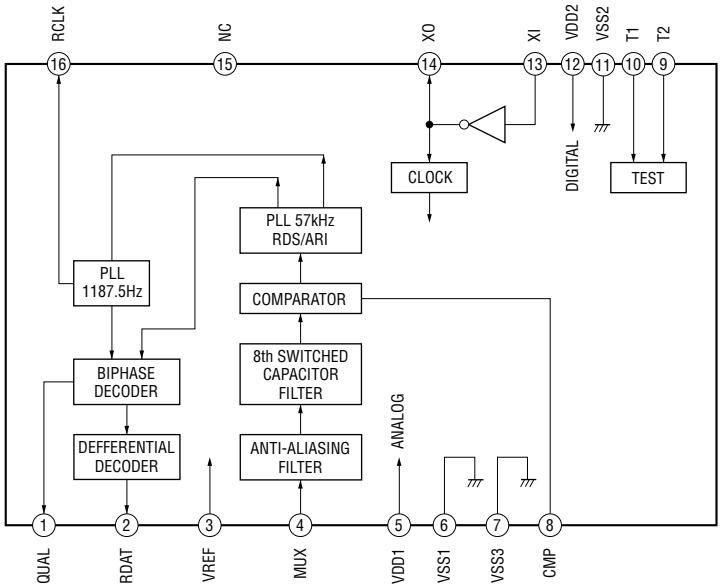
IC301 TDA7439



IC309 KA3082



IC804 BU1924F-E2



6-15. IC PIN FUNCTION DESCRIPTION

• MAIN BOARD IC801 CXP83124A-040Q (SYSTEM CONTROLLER, LCD DRIVER)

Pin No.	Pin Name	I/O	Description
1	TAPE-END	I	Tape end detect sensor input terminal "H" input when the tape end detected
2	RDS-CLK	I	Serial data reading clock signal input from the RDS decoder (IC804) (Used for the AEP and UK models only)
3	REMOCON	I	Sircs remote control signal input from the remote control receiver (IC802)
4	MOT-CON	O	Capstan/reel motor on/off control signal output terminal "H": motor on
5	SOL-CON	O	Trigger plunger on/off control signal output terminal "H": plunger on
6	T-MODE	I	Head position detect switch input terminal "L": forward direction, "H": reverse direction
7	REG-CON	O	Main system power supply on/off control signal output terminal "H": power on
8	CD-CLK	O	Serial data transfer clock signal output to DSP/SSP on the CD block (at CD function)
9	TUNED	I	Tuning detection signal input from the tuner pack "L": tuned
10	CD-DATA/ TU-DATA/ SDA	O	Serial data output to DSP/SSP on the CD block (at CD function) PLL serial data output to PLL IC on the tuner pack (at tuner function) I^2C data output to the TDA7439 (IC301) (all functions)
11	CD-SQCK	O	Subcode Q data reading clock signal output to DSP on the CD block (at CD function)
12	CD-SQSO/ RDS-DATA	I	Subcode Q data input from DSP on the CD block (at CD function) RDS serial data input from the RDS decoder (IC804) (at tuner function) (RDS decoder: used for the AEP and UK models only)
13	TRAY-OPEN	O	Motor drive signal output to the disc tray open/close motor driver (IC309) "H" active *1
14	CD-MUTE	O	Muting on/off control signal output to the CD block "H": muting on
15	TRAY-CLOSE	O	Motor drive signal output to the disc tray open/close motor driver (IC309) "H" active *1
16	CD-SENSE1	I	Internal status detection monitor input from CD block (for FZC, DFCT1, TZC, etc.) (at CD function)
17	CD-XRST	O	Reset signal output to the CD block "L": reset
18	CD-SENSE2/ TU-COUNT	I	Internal status detection monitor input from the CD block (for MIRR, DFCT2, etc.) (at CD function) PLL count data input from PLL IC on the tuner pack (at tuner function)
19	CD-LATCH/ TU-CE	O	Serial data latch pulse output to DSP on the CD block (at CD function) PLL serial chip enable signal output to PLL IC on the tuner pack (at tuner function)
20	JOG-B	I	Jog dial pulse input from the rotary encoder (RV801 VOLUME) (B phase input)
21	JOG-A	I	Jog dial pulse input from the rotary encoder (RV801 VOLUME) (A phase input)
22	AMP-MUTE	O	Muting on/off control signal output to the power amplifier (IC101, 201) "H": muting on
23	AMP-STBY	O	Standby on/off control signal output to the power amplifier (IC101, 201) "L": standby mode
24	VIDEO-ON	O	VIDEO/MD function control signal output terminal "H": VIDEO/MD ("L" output when other functions)
25	TU-ON	O	Power supply on/off control signal output of the tuner pack (+10V) LED drive signal output of the TUNER indicator (D855) "H": tuner power on (LED on)
26	D.S.G.	O	LED drive signal output of the DSG (Dynamic Sound Generator) indicator (D856) "H": LED on
27	CD-SYNC	O	LED drive signal output of the CD SYNC indicator (D857) "H": LED on
28	SCK	O	Serial data transfer clock signal output to the TDA7439 (IC301)
29	TU-CLK	O	PLL serial data transfer clock signal output to PLL IC on the tuner pack (at tuner function)

*1 Disc tray open/close motor control

Mode / Terminal	Stop	Table In	Table Out	Brake
TRAY-OPEN (pin ⑬)	"L"	"L"	"H"	"H"
TRAY-CLOSE (pin ⑮)	"L"	"H"	"L"	"H"

Pin No.	Pin Name	I/O	Description
30	RDS-ON	O	Power supply on/off control signal output of the tuner pack (+7.5V) and RDS decoder (IC804) (RDS decoder: used for the AEP and UK models only) LED drive signal output of the TUNER indicator (D855) "H": tuner power on (LED on)
31	HP-CHK	I	Headphone check detection signal input terminal
32	TC-SW	I	Half detect (side A and B) switch and cassette in detect switch input terminal (A/D input)
33	TRAY-SW	I	Disc tray position detect switch (S901, 902) input terminal (A/D input) "L": close position, "M": open position, "H": moving
34	KEY3	I	Key input terminal (A/D input) S817 to S822, S824 and S825 (STANDBY I/⏻, CD, TUNER, TAPE, MD/VIDEO, DSG, TUNER BAND, CD SYNC keys input)
35	KEY2	I	Key input terminal (A/D input) S801 to S808 (TUNING MODE, CD ▶II/■/▶▶I/I◀◀, PLAY MODE, REPEAT, CD EJECT ⏏ keys input)
36	KEY1	I	Key input terminal (A/D input) S809 to S816 (TAPE ◀◀ ▶/■/▶▶/◀◀/II, REC ●, TUNING +/– keys input)
37	SIMUKE	I	Destination setting terminal (A/D input)
38	$\overline{\text{RESET}}$	I	System reset signal input from the reset signal generator (IC803) "L": reset For several hundreds msec. after the power supply rises, "L" is input, then it changes to "H"
39	EXTAL1	I	Main system clock input terminal (4.19 MHz)
40	XTAL1	O	Main system clock output terminal (4.19 MHz)
41	VSS	—	Ground terminal
42	XTAL2	O	Sub system clock output terminal (500 kHz) Not used (open)
43	EXTAL2	I	Sub system clock input terminal (500 kHz) Not used (fixed at "L")
44	AVREF	I	Reference voltage (+5V) input terminal (for A/D conversion)
45	AVSS	—	Ground terminal (for A/D conversion)
46	VL	O	Liquid crystal display bias on/off control signal output terminal
47 to 49	VLC3 to VLC1	—	Power supply terminal for the liquid crystal display bias
50 to 53	COM0 to COM3	O	Common drive signal output to the liquid crystal display (LCD801)
54 to 85	SEG0 to SEG31	O	Segment drive signal output to the liquid crystal display (LCD801)
86	REC-BIAS	O	Recording bias on/off selection signal output to the HA12203NT (IC352) "L": bias on, "H": bias off
87	REC-MUTE	O	Recording muting on/off selection signal output to the HA12203NT (IC352) "L": muting on, "H": muting off
88	DOLBY	O	Dolby NR on/off selection signal output to the HA12203NT (IC352) "L": dolby on, "H": dolby off
89	VDD	—	Power supply terminal (+5V)
90	NC	—	Connected to power supply (+5V)
91	VSS	—	Ground terminal
92	TX	O	Sub system clock output terminal (32.768 kHz)
93	TEX	I	Sub system clock input terminal (32.768 kHz)
94	CD-ON	O	Power supply on/off control signal output of the CD block (+5V) LED drive signal output of the CD indicator (D852) "H": CD power on (LED on)
95	REC/PB	O	Recording/playback selection signal output to the BA3126N (IC350) and HA12203NT (IC352) "L": playback mode, "H": recording mode
96	L-MUTE	O	Line muting on/off selection signal output to the HA12203NT (IC352) "L": muting on, "H": muting off
97	LINE OUT-MUTE	O	Muting on/off control signal output terminal "H": muting on
98	TC-ON	O	Power supply on/off control signal output of the cassette holder back light LED drive signal output of the TAPE indicator (D854) "H": back light on (LED on)
99	WP	I	Wakeup control signal input terminal
100	CD-SCOR	I	Subcode sync (S0+S1) detection signal input from DSP on the CD block (at CD function)

SECTION 7
EXPLODED VIEWS

NOTE:

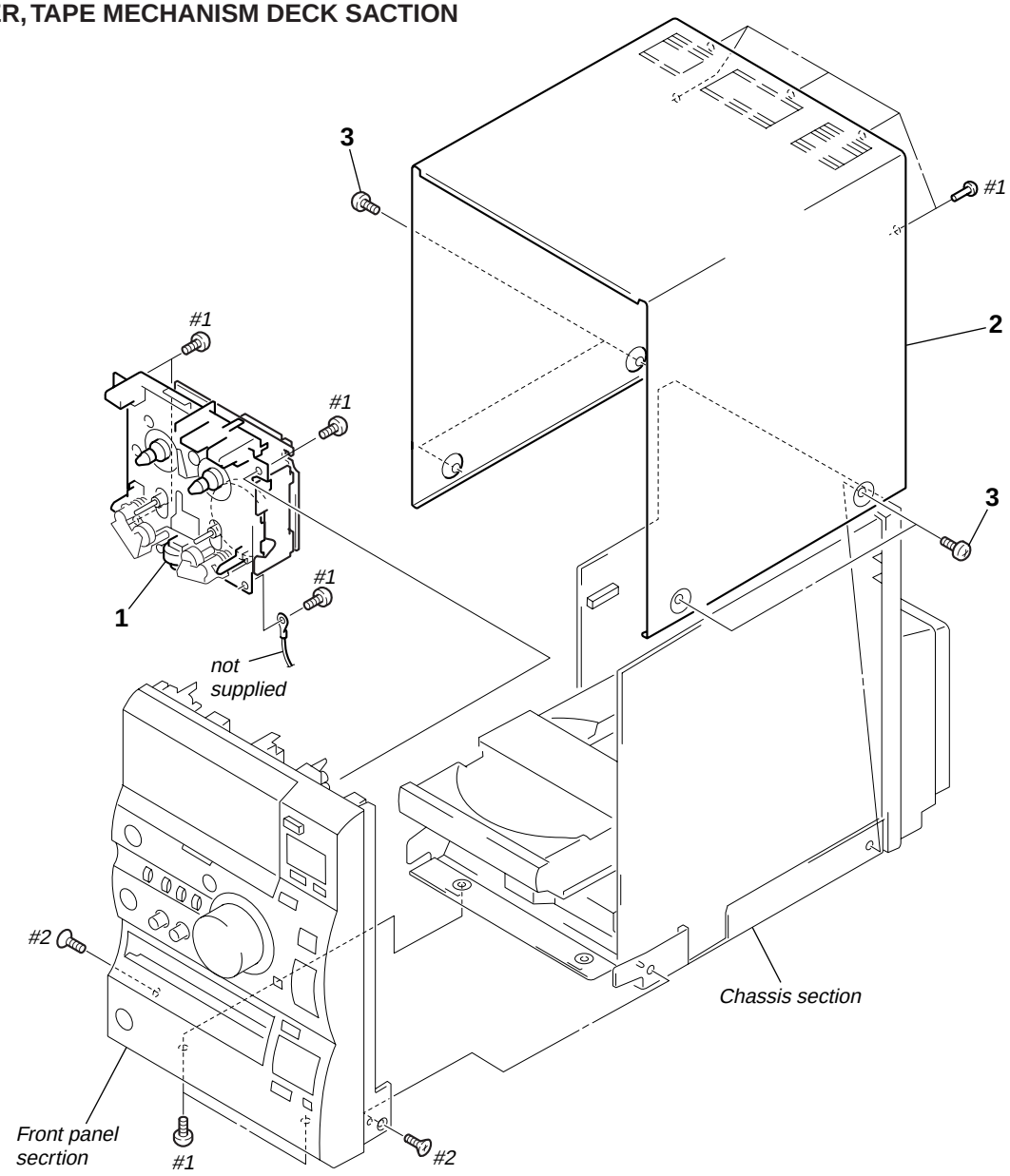
- -XX, -X mean standardized parts, so they may have some differences from the original one.
- Items marked "*" are not stocked since they are seldom required for routine service. Some delay should be anticipated when ordering these items.
- The mechanical parts with no reference number in the exploded views are not supplied.
- Hardware (# mark) list and accessories and packing materials are given in the last of this parts list.

- Abbreviation
  EA : Saudi Arabia model.
  AUS : Australian model.
  SP : Singapore model.
  MY : Malaysia model.
  TW : Taiwan model.
  HK : Hong Kong model.
  AR : Argentine model.
  CND : Canadian model.
  AED : North European model.
  MX : Mexican model.
  KR : Korean model.

The components identified by mark ⚠ or dotted line with mark ⚠ are critical for safety.
Replace only with part number specified.

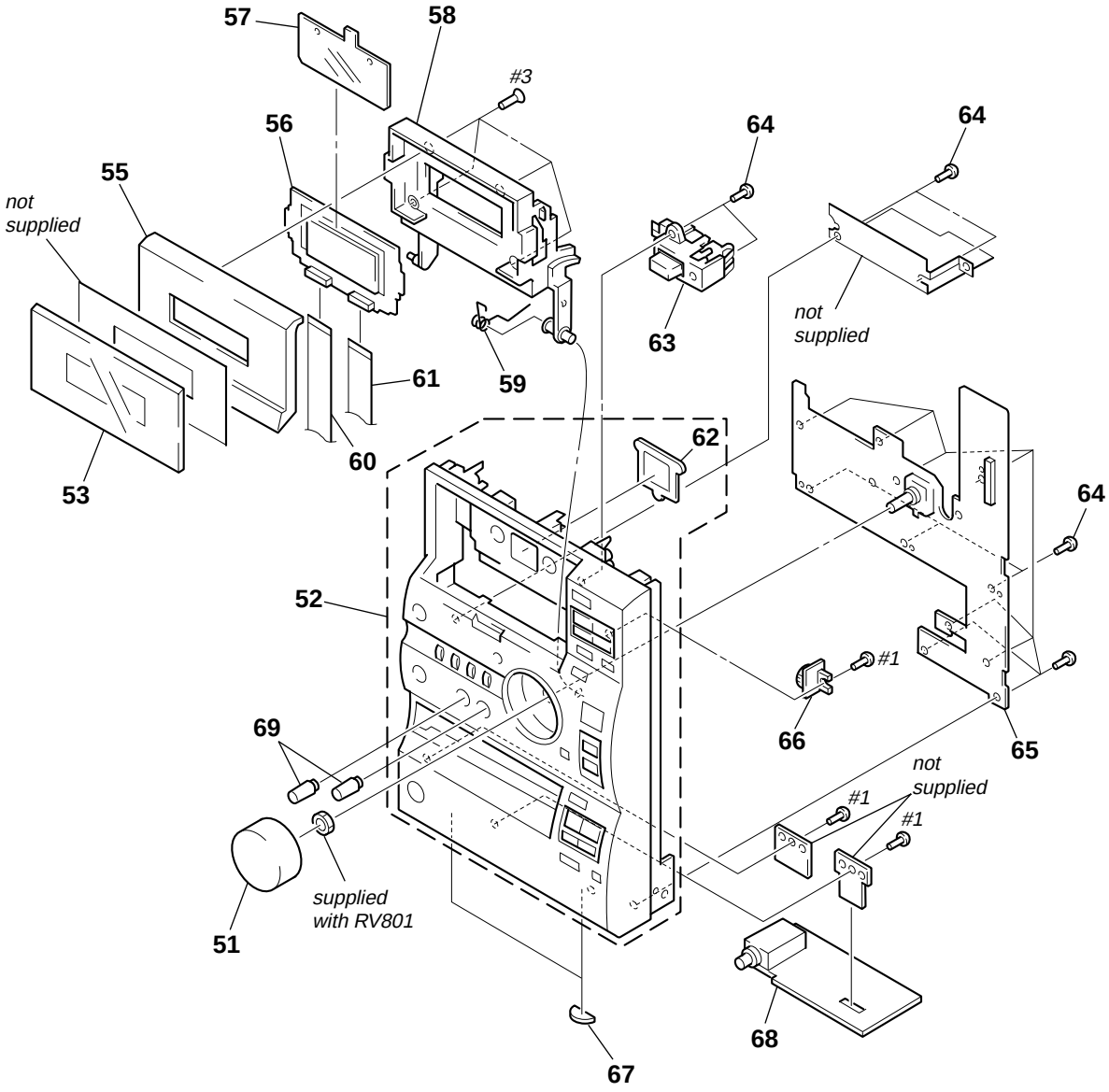
Les composants identifiés par une marque ⚠ sont critiques pour la sécurité.
Ne les remplacer que par une pièce portant le numéro spécifié.

7-1. COVER, TAPE MECHANISM DECK SACTION



Ref. No.	Part No.	Description	Remarks
1	1-772-001-11	DECK,MECHANICAL (TAPE DECK BLOCK)	
2	4-217-341-21	COVER(UPPER)	
3	4-221-580-01	SCREW, CASE	

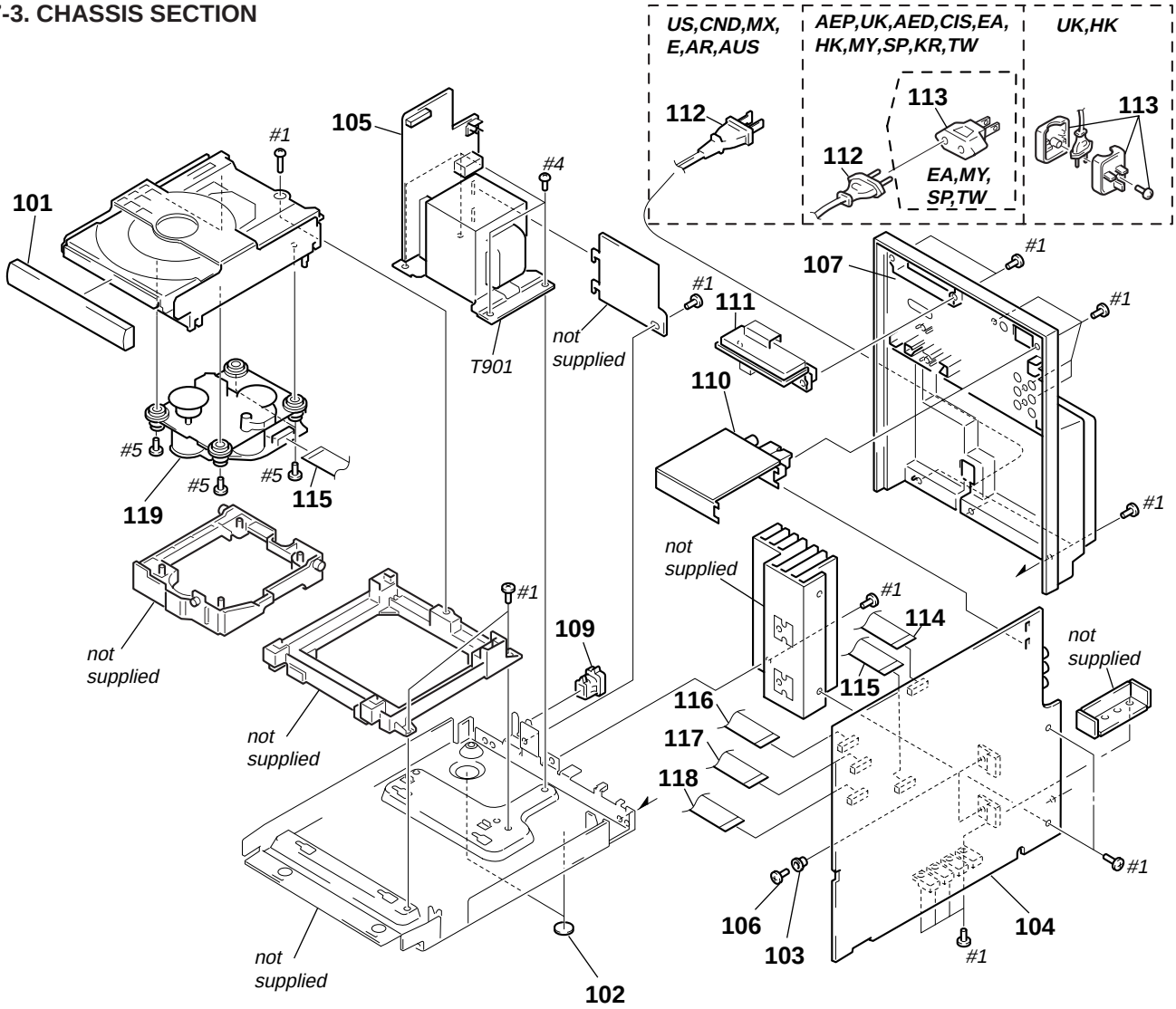
7-2. FRONT PANEL SACTION



Ref. No.	Part No.	Description	Remarks
51	X-4952-336-1	KNOB ASSY	
52	X-4952-728-1	PANEL SUB ASSY, FRONT (AEP,AED,CIS,UK)	
52	X-4952-896-1	PANEL SUB ASSY, FRONT (US,CND,MX,E,EA,AR,HK,MY,SP,TW,AUS)	
52	X-4953-006-1	PANEL SUB ASSY, FRONT (KR)	
53	4-227-956-01	WINDOW (CASSETTE)	
55	4-217-316-01	LID,CASSETTE	
56	1-678-282-11	LCD BOARD	
57	4-217-319-01	PLATE, LCD LIGHT	
58	4-217-317-01	HOLDER (CASSETTE)	
59	4-217-345-01	SPRING, CASSETTE (US,CND,MX,E,EA,AR,HK,MY,SP,KR,TW,AUS)	

Ref. No.	Part No.	Description	Remarks
59	4-229-069-01	SPRING, CASSETTE (AEP,AED,CIS,UK)	
60	1-792-413-11	WIRE(FLAT TYPE) 18CORE	
61	1-792-413-11	WIRE(FLAT TYPE) 20CORE	
62	4-217-320-01	PLATE, BACK LIGHT	
63	X-4951-107-1	LOCK(EJECT) ASSY	
64	4-931-757-31	SCREW(DIA.2.6X8)(IT3B),TAPPING	
65	A-4428-915-A	CONTROL BOARD, COMPLETE	
66	3-351-377-11	GEAR, DAMPER	
67	4-218-204-01	FOOT(FRONT)	
68	1-677-147-11	HEADPHONE BOARD	
69	4-227-282-01	KNOB(BASS)	

7-3. CHASSIS SECTION

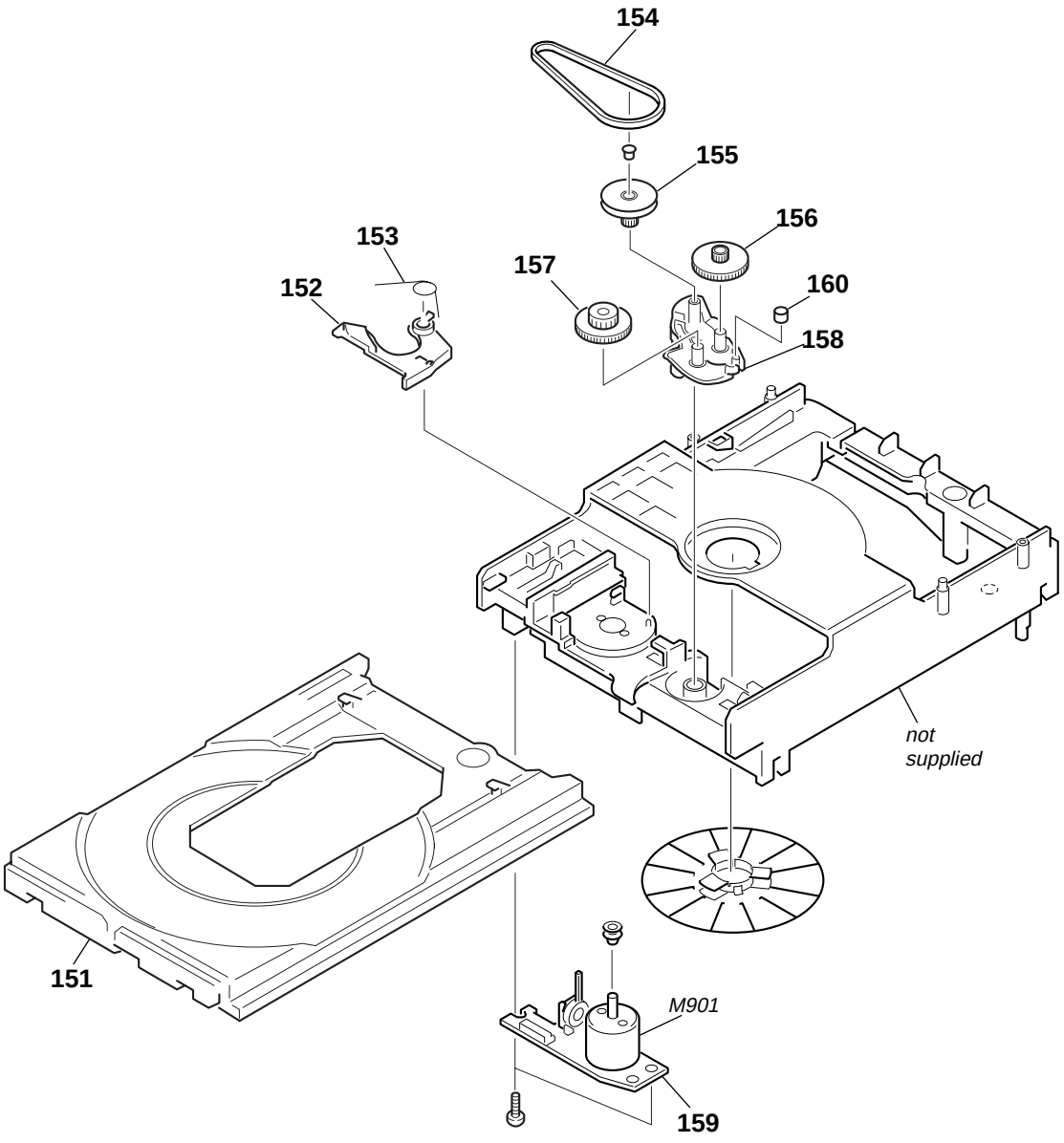


Ref. No.	Part No.	Description	Remarks
101	4-227-281-01	LID(CD)	
102	4-217-355-01	FOOT	
* 103	4-217-354-01	BUSHING, INSULATING	
104	A-4428-920-A	MAIN BOARD, COMPLETE (AEP,AED,CIS,UK)	
104	A-4473-503-A	MAIN BOARD, COMPLETE (MX)	
104	A-4473-505-A	MAIN BOARD, COMPLETE (US,CND)	
104	A-4473-507-A	MAIN BOARD, COMPLETE (EA,HK,MY,SP,TW)	
104	A-4473-512-A	MAIN BOARD, COMPLETE (AUS)	
104	A-4473-513-A	MAIN BOARD, COMPLETE (E,AR)	
104	A-4473-652-A	MAIN BOARD, COMPLETE (KR)	
105	1-677-145-11	POWER BOARD (AEP,AED,CIS,UK,AUS)	
105	1-677-145-21	POWER BOARD (E,EA,AR,HK,MY,SP,TW)	
105	1-677-145-31	POWER BOARD (US,CND,MX)	
105	1-677-145-41	POWER BOARD (KR)	
106	4-931-757-31	SCREW(DIA.2.6X8)(IT3B),TAPPING	
107	4-227-293-01	PANEL, BACK (AEP,AED,CIS,UK)	
107	4-227-293-11	PANEL, BACK (US,CND,MX,KR)	
107	4-227-293-21	PANEL, BACK (E,EA,AR,HK,MY,SP,TW)	
107	4-227-293-41	PANEL, BACK (AUS)	
109	4-217-350-01	STOPPER, CORD (US,CND,MX,E,EA,AR,MY,SP,KR,AUS)	
109	4-217-350-11	STOPPER, CORD (AEP,AED,CIS,UK,HK,TW)	
110	A-4303-600-A	TUNER BLOCK (AED,CIS,AUS)	
110	A-4303-604-A	TUNER BLOCK (MX,E,EA,AR,HK,MY,SP,KR,TW)	

Ref. No.	Part No.	Description	Remarks
110	A-4303-605-A	TUNER BLOCK(US,CND)	
110	A-4303-600-A	TUNER BLOCK(AEP,UK)	
111	1-677-146-11	SPEAKER BOARD	
⚠112	1-696-169-11	CORD, POWER (AEP,AED,CIS,UK,EA,HK,MY,SP,TW)	
⚠112	1-696-848-41	CORD, POWER (AUS)	
⚠112	1-769-079-21	CORD, POWER (KR)	
⚠112	1-775-789-91	CORD, POWER (MX,E)	
⚠112	1-783-820-11	CORD, POWER (US,CND)	
⚠112	1-783-941-21	CORD, POWER (AR)	
⚠113	1-770-019-11	ADAPTOR, CONVERSION PLUG 3P (UK,HK)	
⚠113	1-569-008-21	ADAPTOR, CONVERSION PLUG 2P (EA,MY,SP,TW)	
114	1-792-409-11	WIRE (FLAT TYPE) 21CORE	
115	1-792-411-11	WIRE (FLAT TYPE) 19CORE	
116	1-792-412-11	WIRE (FLATTYPE) 20CORE	
117	1-172-413-11	WIRE (FLATTYPE) 18CORE	
118	1-792-410-11	WIRE (FLAT TYPE) 23CORE	
119	A-4677-289-A	CD BLOCK	
⚠T901	1-435-101-11	TRANSFORMER, POWER (E,EA,AR,HK,MY,SP,TW)	
⚠T901	1-435-385-11	TRANSFORMER, POWER (US,CND,MX)	
⚠T901	1-435-386-11	TRANSFORMER, POWER (AEP,AED,CIS,UK,AUS,KR)	

The components identified by mark ⚠ or dotted line with mark ⚠ are critical for safety. Replace only with part number specified.	Les composants identifiés par une marque ⚠ sont critiques pour la sécurité. Ne les remplacer que par une pièce portant le numéro spécifié.

7-4. CD MECHANISM DECK SECTION



Ref. No.	Part No.	Description	Remarks
151	4-224-894-01	TRAY	
152	4-220-229-01	LEVER (SW)	
153	4-220-239-01	SPRING, TORSION	
154	4-221-816-01	BELT (CDM55)	
155	4-220-234-01	PULLEY (LDG)	
156	4-220-237-01	GEAR (A)	
157	4-220-238-01	GEAR (B)	
158	4-220-233-01	CAM(CDM55)	
159	1-676-599-11	LOADING BOARD	
160	4-221-815-01	ROLLER	
M901	1-763-418-11	MOTOR, DC	

SECTION 8
ELECTRICAL PARTS LIST

NOTE:

- Due to standardization, replacements in the parts list may be different from the parts specified in the diagrams or the components used on the set.
- -XX, -X mean standardized parts, so they may have some difference from the original one.
- Items marked "*" are not stocked since they are seldom required for routine service. Some delay should be anticipated when ordering these items.
- RESISTORS
  All resistors are in ohms.
  METAL: metal-film resistor
  METAL OXIDE: Metal Oxide-film resistor
  F: nonflammable
- CAPACITORS:
  uF: µF
- COILS
  uH: µH
- SEMICONDUCTORS
  In each case, u: µ, for example:
  uA...: µA... , uPA... , µPA... ,
  uPB... , µPB... , uPC... , µPC... ,
  uPD..., µPD...

When indicating parts by reference number, please include the board name.

The components identified by mark ⚠ or dotted line with mark ⚠ are critical for safety. Replace only with part number specified.

Les composants identifiés par une marque ⚠ sont critiques pour la sécurité. Ne les remplacer que par une pièce portant le numéro spécifié.

- Abbreviation
  EA : Saudi Arabia model.
  AUS : Australian model.
  SP : Singapore model.
  MY : Malaysia model.
  TW : Taiwan model.
  HK : Hong Kong model.
  AR : Argentine model.
  CND : Canadian model.
  AED : North European model.
  MX : Mexican model.
  KR : Korean model.

Ref. No.	Part No.	Description			Remarks
	A-4428-915-A	CONTROL BOARD, COMPLETE			
		**********			
		< CAPACITOR >			
C601	1-124-259-11	ELECT	4.7uF	20.00% 16V	
C602	1-163-021-91	CERAMIC CHIP	0.01uF	10.00% 50V	
		< CONNECTOR >			
CN805	1-569-939-31	SOCKET, CONNECTOR 23P			
		< DIODE >			
D851	8-719-074-42	DIODE SLR325VR-T31 (STANDBY)			
D852	8-719-074-40	DIODE SLR325DU-T31 (CD)			
D853	8-719-074-40	DIODE SLR325DU-T31 (MD/VIDEO)			
D854	8-719-074-40	DIODE SLR325DU-T31 (TAPE)			
D855	8-719-074-40	DIODE SLR325DU-T31 (TUNER)			
D856	8-719-074-42	DIODE SLR325VR-T31 (DSG)			
D857	8-719-074-42	DIODE SLR325VR-T31 (CD SYNC)			
D858	8-719-075-50	DIODE SELS6B14C-TP5 (CD DISC)			
		< IC >			
IC802	8-742-208-20	IC SBX3076-01 (REMOTE CONTROL RECEIVER)			
		< TRANSISTOR >			
Q852	8-729-900-53	TRANSISTOR	DTC114EKA-T146		
Q853	8-729-900-53	TRANSISTOR	DTC114EKA-T146		
Q854	8-729-900-53	TRANSISTOR	DTC114EKA-T146		
Q855	8-729-900-53	TRANSISTOR	DTC114EKA-T146		
Q856	8-729-900-53	TRANSISTOR	DTC114EKA-T146		
Q857	8-729-900-53	TRANSISTOR	DTC114EKA-T146		
Q858	8-729-900-53	TRANSISTOR	DTC114EKA-T146		
Q859	8-729-900-53	TRANSISTOR	DTC114EKA-T146		
		< RESISTOR >			
R590	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R591	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R592	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R593	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R601	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R602	1-216-045-00	METAL CHIP	680	5%	1/10W
R603	1-216-047-91	RES-CHIP	820	5%	1/10W
R604	1-216-051-00	METAL CHIP	1.2K	5%	1/10W
R605	1-216-055-00	METAL CHIP	1.8K	5%	1/10W
R606	1-216-061-00	METAL CHIP	3.3K	5%	1/10W
R607	1-216-069-00	METAL CHIP	6.8K	5%	1/10W
R608	1-216-079-00	METAL CHIP	18K	5%	1/10W
R609	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R610	1-216-045-00	METAL CHIP	680	5%	1/10W
R611	1-216-047-91	RES-CHIP	820	5%	1/10W
R612	1-216-051-00	METAL CHIP	1.2K	5%	1/10W
R613	1-216-055-00	METAL CHIP	1.8K	5%	1/10W
R614	1-216-061-00	METAL CHIP	3.3K	5%	1/10W
R615	1-216-069-00	METAL CHIP	6.8K	5%	1/10W
R616	1-216-079-00	METAL CHIP	18K	5%	1/10W
R617	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R618	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R660	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R661	1-216-033-00	METAL CHIP	220	5%	1/10W
R662	1-216-043-91	RES-CHIP	560	5%	1/10W
R666	1-216-051-00	METAL CHIP	1.2K	5%	1/10W
R667	1-216-051-00	METAL CHIP	1.2K	5%	1/10W
R668	1-216-041-00	METAL CHIP	470	5%	1/10W
R669	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R680	1-216-045-00	METAL CHIP	680	5%	1/10W
R681	1-216-047-91	RES-CHIP	820	5%	1/10W
R683	1-216-051-00	METAL CHIP	1.2K	5%	1/10W
R684	1-216-055-00	METAL CHIP	1.8K	5%	1/10W
R685	1-216-061-00	METAL CHIP	3.3K	5%	1/10W
R686	1-216-069-00	METAL CHIP	6.8K	5%	1/10W
R687	1-216-079-00	METAL CHIP	18K	5%	1/10W
R688	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
		< VARIABLE RESISTOR >			
RV801	1-473-392-11	ENCODER, ROTARY (VOLUME)			
RV802	1-418-859-11	ENCODER, ROTARY (TREBLE)			
RV803	1-418-859-11	ENCODER, ROTARY (BASS)			
		< SWITCH >			
S801	1-571-760-11	SWITCH, KEY BOARD (TUNING MODE)			
S802	1-571-760-11	SWITCH, KEY BOARD (CD PLAY)			
S803	1-571-760-11	SWITCH, KEY BOARD (CD STOP)			
S804	1-571-760-11	SWITCH, KEY BOARD (CD FWD)			
S805	1-571-760-11	SWITCH, KEY BOARD (CD REV)			

Ref. No.	Part No.	Description	Remarks
S806	1-571-760-11	SWITCH, KEY BOARD (CD PLAY MODE)	
S807	1-571-760-11	SWITCH, KEY BOARD (CD REPEAT)	
S808	1-571-760-11	SWITCH, KEY BOARD (CD EJECT)	
S809	1-571-760-11	SWITCH, KEY BOARD (TAPE PLAY)	
S810	1-571-760-11	SWITCH, KEY BOARD (TAPE STOP)	
S811	1-571-760-11	SWITCH, KEY BOARD (TAPE FF)	
S812	1-571-760-11	SWITCH, KEY BOARD (TAPE REW)	
S813	1-571-760-11	SWITCH, KEY BOARD (TAPE PAUSE)	
S814	1-571-760-11	SWITCH, KEY BOARD (TAPE REC)	
S815	1-571-760-11	SWITCH, KEY BOARD (TUNING +)	
S816	1-571-760-11	SWITCH, KEY BOARD (TUNING -)	
S817	1-571-760-11	SWITCH, KEY BOARD (STANDBY)	
S818	1-571-760-11	SWITCH, KEY BOARD (CD)	
S819	1-571-760-11	SWITCH, KEY BOARD (TUNER)	
S820	1-571-760-11	SWITCH, KEY BOARD (TAPE)	
S821	1-571-760-11	SWITCH, KEY BOARD (MD/VIDEO)	
S822	1-571-760-11	SWITCH, KEY BOARD (DSG)	
S823	1-571-760-11	SWITCH, KEY BOARD (TUNER BAND)	
S824	1-571-760-11	SWITCH, KEY BOARD (CD SYNC)	
**********			
	1-677-147-11	HEADPHONE BOARD **********	
		< CAPACITOR >	
C132	1-124-584-00	CAP, ELECT 100MF	
C134	1-163-037-11	CAP, CERAMIC 22000PF B	(2012)
C232	1-124-584-00	CAP, ELECT 100MF	
C234	1-163-037-11	CAP, CERAMIC 22000PF B	(2012)
		< TRANSISTOR >	
Q132	8-729-920-31	TRANSISTOR DTC343TK-T-146	
Q232	8-729-920-31	TRANSISTOR DTC343TK-T-146	
		< JACK >	
J301	1-785-925-11	JACK (PHONES)	
		< COIL >	
L102	1-416-993-41	INDUCTOR 1uH	
L202	1-416-993-41	INDUCTOR 1uH	
L302	1-416-993-41	INDUCTOR 1uH	
		< RESISTOR >	
R128	1-216-019-00	RES, CHIP 56	(2012)
R228	1-216-019-00	RES, CHIP 56	(2012)
**********			
	1-678-282-11	LCD BOARD **********	
		< CONNECTOR >	
CN801	1-785-950-11	CONNECTOR, FFC/FPC 18P	
CN803	1-785-949-11	CONNECTOR, FFC/FPC 20P	
		< DIODE >	
D657	8-719-075-51	DIODE SELS6B14C-LF62 (LCD BACK LIGHT)	
D658	8-719-075-51	DIODE SELS6B14C-LF62 (LCD BACK LIGHT)	
D659	8-719-075-51	DIODE SELS6B14C-LF62 (LCD BACK LIGHT)	
D660	8-719-075-51	DIODE SELS6B14C-LF62 (LCD BACK LIGHT)	

Ref. No.	Part No.	Description				Remarks
		< LIQUID CRYSTAL DISPLAY >				
LCD801	1-803-542-11	DISPLAY PANEL, LIQUID CRYSTAL				
		< RESISTOR >				
R647	1-249-408-11	CARBON	180	5%	1/4W	F
R649	1-249-408-11	CARBON	180	5%	1/4W	F
**********						
	1-676-599-11	LOADING BOARD **********				
		< CONNECTOR >				
* CN1	1-568-943-11	PIN, CONNECTOR 5P				
		< SWITCH >				
S1	1-771-799-11	SWITCH, LEVER (SLIDE)				
**********						
	A-4428-920-A	MAIN BOARD, COMPLETE (AEP,AED,CIS,UK) **********				
	A-4473-503-A	MAIN BOARD, COMPLETE (MX) **********				
	A-4473-505-A	MAIN BOARD, COMPLETE (US,CND) **********				
	A-4473-513-A	MAIN BOARD, COMPLETE (E,AR) **********				
	A-4473-507-A	MAIN BOARD, COMPLETE (EA,HK,MY,SP,TW) **********				
	A-4473-512-A	MAIN BOARD, COMPLETE (AUS) **********				
	A-4473-652-A	MAIN BOARD, COMPLETE (KR) **********				
*	4-217-354-01	BUSHING, INSULATING				
	4-931-757-31	SCREW(DIA.2.6X8)(IT3B),TAPPING				
	7-685-546-14	SCREW+BTP 3X8 TYPE2 N-S				
		< CAPACITOR >				
C101	1-126-964-11	ELECT	10uF	20.00%	50V	
C102	1-126-963-11	ELECT	4.7uF	20.00%	50V	
C103	1-126-963-11	ELECT	4.7uF	20.00%	50V	
C104	1-126-963-11	ELECT	4.7uF	20.00%	50V	
C105	1-126-963-11	ELECT	4.7uF	20.00%	50V	
C106	1-126-963-11	ELECT	4.7uF	20.00%	50V	
C107	1-163-020-00	CERAMIC CHIP	0.0082uF	10%	50V	(EA,HK,MY,SP,TW)
C107	1-163-022-00	CERAMIC CHIP	0.012uF	10%	50V	(US,CND,E,MX,AR,AUS,KR)
C107	1-163-023-00	CERAMIC CHIP	0.015uF	5%	50V	(AEP,UK,AED,CIS)
C109	1-126-963-11	ELECT	4.7uF	20.00%	50V	
C110	1-126-963-11	ELECT	4.7uF	20.00%	50V	
C111	1-163-023-00	CERAMIC CHIP	0.015uF	5%	50V	
C112	1-163-023-00	CERAMIC CHIP	0.015uF	5%	50V	
C113	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V	
C114	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V	
C115	1-163-014-00	CERAMIC CHIP	0.0027uF	10.00%	50V	
C116	1-163-005-11	CERAMIC CHIP	470PF	10%	50V	
C117	1-163-005-11	CERAMIC CHIP	470PF	10%	50V	
C118	1-163-005-11	CERAMIC CHIP	470PF	10%	50V	
C119	1-163-117-00	CERAMIC CHIP	100PF	5%	50V	

MAIN

Ref. No.	Part No.	Description			Remarks
C120	1-104-665-11	ELECT	100uF	20.00%	16V
C121	1-126-963-11	ELECT	4.7uF	20.00%	50V
C122	1-163-005-11	CERAMIC CHIP	470PF	10%	50V
C123	1-126-965-11	ELECT	22uF	20.00%	50V
C126	1-126-965-11	ELECT	22uF	20.00%	50V
C130	1-104-664-11	ELECT	47uF	20.00%	16V
C131	1-163-117-00	CERAMIC CHIP	100PF	5%	50V
C150	1-126-572-11	ELECT	4.7uF	20.00%	35V
C201	1-126-964-11	ELECT	10uF	20.00%	50V
C202	1-126-963-11	ELECT	4.7uF	20.00%	50V
C203	1-126-963-11	ELECT	4.7uF	20.00%	50V
C204	1-126-963-11	ELECT	4.7uF	20.00%	50V
C205	1-126-963-11	ELECT	4.7uF	20.00%	50V
C206	1-126-963-11	ELECT	4.7uF	20.00%	50V
C207	1-163-020-00	CERAMIC CHIP	0.0082uF	10%	50V (EA,HK,MY,SP,TW)
C207	1-163-022-00	CERAMIC CHIP	0.012uF	10%	50V (US,CND,E,MX,AR,AUS,KR)
C207	1-163-023-00	CERAMIC CHIP	0.015uF	5%	50V (AEP,UK,AED,CIS)
C209	1-126-963-11	ELECT	4.7uF	20.00%	50V
C210	1-126-963-11	ELECT	4.7uF	20.00%	50V
C211	1-163-023-00	CERAMIC CHIP	0.015uF	5%	50V
C212	1-163-023-00	CERAMIC CHIP	0.015uF	5%	50V
C213	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C214	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C215	1-163-014-00	CERAMIC CHIP	0.0027uF	10.00%	50V
C216	1-163-005-11	CERAMIC CHIP	470PF	10%	50V
C217	1-163-005-11	CERAMIC CHIP	470PF	10%	50V
C218	1-163-005-11	CERAMIC CHIP	470PF	10%	50V
C219	1-163-117-00	CERAMIC CHIP	100PF	5%	50V
C220	1-104-665-11	ELECT	100uF	20.00%	16V
C221	1-126-963-11	ELECT	4.7uF	20.00%	50V
C222	1-163-005-11	CERAMIC CHIP	470PF	10%	50V
C223	1-126-965-11	ELECT	22uF	20.00%	50V
C226	1-126-965-11	ELECT	22uF	20.00%	50V
C230	1-104-664-11	ELECT	47uF	20.00%	16V
C231	1-163-117-00	CERAMIC CHIP	100PF	5%	50V
C250	1-126-572-11	ELECT	4.7uF	20.00%	35V
C301	1-126-964-11	ELECT	10uF	20.00%	50V
C302	1-124-119-00	ELECT	330uF	20%	16V
C303	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C304	1-126-964-11	ELECT	10uF	20.00%	50V
C305	1-104-666-11	ELECT	220uF	20.00%	16V
C308	1-126-963-11	ELECT	4.7uF	20.00%	50V
C309	1-126-964-11	ELECT	10uF	20.00%	50V
C310	1-126-955-11	ELECT	4700uF	20.00%	35V
C311	1-126-955-11	ELECT	4700uF	20.00%	35V
C312	1-126-942-61	ELECT	1000uF	20.00%	25V
C313	1-126-944-11	ELECT	3300uF	20.00%	25V
C314	1-104-666-11	ELECT	220uF	20.00%	16V
C315	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C316	1-104-666-11	ELECT	220uF	20.00%	16V
C317	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C318	1-104-666-11	ELECT	220uF	20.00%	16V
C319	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C320	1-126-935-11	ELECT	470uF	20.00%	16V
C323	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C324	1-104-666-11	ELECT	220uF	20.00%	10V
C325	1-126-964-11	ELECT	10uF	20.00%	50V
C326	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C327	1-104-665-11	ELECT	100uF	20.00%	16V
C328	1-104-665-11	ELECT	100uF	20.00%	16V
C329	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C330	1-104-665-11	ELECT	100uF	20.00%	16V
C331	1-104-665-11	ELECT	100uF	20.00%	16V
C337	1-104-666-11	ELECT	220uF	20.00%	16V
C338	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C341	1-104-665-11	ELECT	100uF	20.00%	16V
C346	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C347	1-104-664-11	ELECT	47uF	20.00%	16V
C348	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C350	1-104-665-11	ELECT	100uF	20.00%	16V
C351	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C359	1-126-963-11	ELECT	4.7uF	20.00%	50V
C362	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C363	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C364	1-164-159-21	CERAMIC	0.1uF		50V
C365	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C367	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C368	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C390	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V (US,CND,AEP,UK,E,AED,CIS,MX,AR,AUS,KR)
C603	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V (AEP,AED,CIS,UK)
C604	1-163-251-11	CERAMIC CHIP	100PF	5.00%	50V
C605	1-163-251-11	CERAMIC CHIP	100PF	5.00%	50V
C651	1-163-009-11	CERAMIC CHIP	0.001uF	10%	50V
C652	1-163-009-11	CERAMIC CHIP	0.001uF	10%	50V
C801	1-163-102-00	CERAMIC CHIP	24PF	5.00%	50V
C802	1-163-102-00	CERAMIC CHIP	24PF	5.00%	50V
C803	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C804	1-163-021-91	CERAMIC CHIP	0.01uF	10.00%	50V
C808	1-163-021-91	CERAMIC CHIP	0.01uF	10.00%	50V
C809	1-126-964-11	ELECT	10uF	20.00%	50V
C810	1-128-647-11	CAP, DOUBLE LAYER		0.1F	
C811	1-163-235-11	CERAMIC CHIP	22PF	5.00%	50V
C812	1-163-237-11	CERAMIC CHIP	27PF	5.00%	50V
C813	1-163-135-00	CERAMIC CHIP	560PF	5%	50V (AEP,AED,CIS,UK)
C814	1-104-664-11	ELECT	47uF	20.00%	16V (AEP,AED,CIS,UK)
C815	1-163-021-91	CERAMIC CHIP	0.01uF	10.00%	50V (AEP,AED,CIS,UK)
C816	1-163-096-00	CERAMIC CHIP	13PF	5%	50V (AEP,AED,CIS,UK)
C817	1-163-096-00	CERAMIC CHIP	13PF	5%	50V (AEP,AED,CIS,UK)
C818	1-126-963-11	ELECT	4.7uF	20.00%	50V (AEP,AED,CIS,UK)
C819	1-163-003-11	CERAMIC CHIP	330PF	10%	50V (AEP,AED,CIS,UK)
C820	1-163-117-00	CERAMIC CHIP	100PF	5%	50V
C821	1-163-117-00	CERAMIC CHIP	100PF	5%	50V
C822	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C823	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C824	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V

Ref. No.	Part No.	Description	Remarks
C825	1-164-159-21	CERAMIC 0.1uF 50V	
C827	1-163-005-11	CERAMIC CHIP 470PF 10% 50V	
		< CONNECTOR >	
* CN303	1-568-954-11	PIN, CONNECTOR 5P	
* CN306	1-568-954-11	PIN, CONNECTOR 5P	
* CN316	1-569-935-11	SOCKET, CONNECTOR 19P	
CN401	1-569-937-11	SOCKET, CONNECTOR 21P	
CN802	1-785-951-11	CONNECTOR, FFC/FPC (ZIF) 18P	
CN804	1-785-952-11	CONNECTOR, FFC/FPC (ZIF) 20P	
CN806	1-569-939-31	SOCKET, CONNECTOR 23P	
* CN807	1-569-935-11	SOCKET, CONNECTOR 19P	
* CN808	1-569-935-11	SOCKET, CONNECTOR 19P	
		< DIODE >	
D301	8-719-110-31	DIODE MTZJ-T-77-12B	
D303	8-719-921-63	DIODE MTZJ-T-77-7.5B	
D304	8-719-921-75	DIODE MTZN-T-77-10B	
D305	8-719-109-89	DIODE MTZJ-T-77-5.6B	
D306	8-719-110-03	DIODE MTZJ-T-77-7.5C	
D307	8-719-991-33	DIODE 1SS133T-77	
D308	8-719-982-11	DIODE MTZJ-T-77-4.3B (US,CND,MX,E,EA,AR,HK,MY,SP,KR,TW,AUS)	
D308	8-719-109-85	DIODE MTZJ-T-77-5.1B (AEP,AED,CIS,UK)	
D309	8-719-110-08	DIODE MTZJ-T-77-8.2B	
D311	8-719-991-33	DIODE 1SS133T-77	
D313	8-719-991-33	DIODE 1SS133T-77	
D350	8-719-110-31	DIODE MTZJ-T-77-12B	
D390	8-719-200-82	DIODE 11ES2-TA1B (US,CND,AEP,UK,E,AED,CIS,MX,AR,AUS,KR)	
D391	8-719-921-75	DIODE MTZN-T-77-10B (US,CND,AEP,UK,E,AED,CIS,MX,AR,AUS,KR)	
D392	8-719-991-33	DIODE 1SS133T-77 (US,CND,AEP,UK,E,AED,CIS,MX,AR,AUS,KR)	
D651	8-719-200-82	DIODE 11ES2-TA1B	
D652	8-719-200-82	DIODE 11ES2-TA1B	
D801	8-719-991-33	DIODE 1SS133T-77	
D802	8-719-991-33	DIODE 1SS133T-77	
D810	8-719-982-11	DIODE MTZJ-T-77-4.3B (AEP,AED,CIS,UK)	
D812	8-719-991-33	DIODE 1SS133T-77	
D813	8-719-991-33	DIODE 1SS133T-77	
D814	8-719-991-33	DIODE 1SS133T-77	
D815	8-719-991-33	DIODE 1SS133T-77	
		< IC >	
IC101	8-759-584-38	IC TDA7296	
IC201	8-759-584-38	IC TDA7296	
IC301	8-759-585-01	IC TDA7439	
IC303	8-759-545-66	IC NJM3414AM-TE2	
IC304	8-759-584-41	IC K1A7808PI	
IC305	8-759-584-40	IC KA7908	
IC307	8-759-909-71	IC BA4558F-E2	
IC308	8-749-921-12	IC GP1F32T (CD DIGITAL OUT OPTICAL)	
IC309	8-759-584-65	IC KA3082	
IC310	8-759-324-40	IC KIA7805PI	
IC311	8-759-584-41	IC K1A7808PI	
IC801	8-752-898-87	IC CXP83124A-040Q	
IC803	8-759-584-64	IC BMR0301H	
IC804	8-759-557-36	IC BU1924F-E2(AEP,AED,CIS,UK)	

Ref. No.	Part No.	Description	Remarks
		< COIL >	
L801	1-414-138-11	INDUCTOR 0.33uH	
L802	1-414-138-11	INDUCTOR 0.33uH	
		< JACK >	
PJ301	1-785-926-11	JACK, PIN 6P (LINE OUT/MD IN/VIDEO IN)	
		< TRANSISTOR >	
Q101	8-729-920-31	TRANSISTOR DTC343TK-T-146	
Q102	8-729-920-31	TRANSISTOR DTC343TK-T-146	
Q103	8-729-920-31	TRANSISTOR DTC343TK-T-146	
Q106	8-729-920-31	TRANSISTOR DTC343TK-T-146	
Q111	8-729-920-31	TRANSISTOR DTC343TK-T-146	
Q201	8-729-920-31	TRANSISTOR DTC343TK-T-146	
Q202	8-729-920-31	TRANSISTOR DTC343TK-T-146	
Q203	8-729-920-31	TRANSISTOR DTC343TK-T-146	
Q206	8-729-920-31	TRANSISTOR DTC343TK-T-146	
Q211	8-729-920-31	TRANSISTOR DTC343TK-T-146	
Q301	8-729-019-00	TRANSISTOR 2SD2394-G	
Q302	8-729-027-23	TRANSISTOR DTA114EKA-T146	
Q303	8-729-901-00	TRANSISTOR DTC124EKA-T146	
Q307	8-729-027-31	TRANSISTOR DTA124EKA-T146	
Q308	8-729-900-53	TRANSISTOR DTC114EKA-T146	
Q310	8-729-019-00	TRANSISTOR 2SD2394-G	
Q311	8-729-027-23	TRANSISTOR DTA114EKA-T146	
Q312	8-729-901-00	TRANSISTOR DTC124EKA-T146	
Q313	8-729-028-54	TRANSISTOR KTC3205-Y-AT	
Q314	8-729-028-54	TRANSISTOR KTC3205-Y-AT	
Q315	8-729-027-23	TRANSISTOR DTA114EKA-T146	
Q316	8-729-901-00	TRANSISTOR DTC124EKA-T146	
Q317	8-729-027-23	TRANSISTOR DTA114EKA-T146	
Q318	8-729-901-00	TRANSISTOR DTC124EKA-T146	
Q321	8-729-027-23	TRANSISTOR DTA114EKA-T146	
Q322	8-729-901-00	TRANSISTOR DTC124EKA-T146	
Q323	8-729-801-84	TRANSISTOR 2SB1013-TP-34 (US,CND,AEP,UK,E,AED,CIS,MX,AR,AUS,KR)	
Q324	8-729-901-00	TRANSISTOR DTC124EKA-T146 (US,CND,AEP,UK,E,AED,CIS,MX,AR,AUS,KR)	
Q325	8-729-027-23	TRANSISTOR DTA114EKA-T146	
Q326	8-729-900-53	TRANSISTOR DTC114EKA-T146	
Q350	8-729-019-00	TRANSISTOR 2SD2394-G	
Q351	8-729-027-23	TRANSISTOR DTA114EKA-T146	
Q352	8-729-901-00	TRANSISTOR DTC124EKA-T146	
Q390	8-729-019-72	TRANSISTOR 2SB1260T100 (US,CND,AEP,UK,E,AED,CIS,MX,AR,AUS,KR)	
Q391	8-729-920-31	TRANSISTOR DTC343TK-T-146 (US,CND,AEP,UK,E,AED,CIS,MX,AR,AUS,KR)	
Q392	8-729-920-31	TRANSISTOR DTC343TK-T-146 (US,CND,AEP,UK,E,AED,CIS,MX,AR,AUS,KR)	
Q651	8-729-900-53	TRANSISTOR DTC114EKA-T146	
Q652	8-729-801-84	TRANSISTOR 2SB1013-TP-34	
Q653	8-729-801-84	TRANSISTOR 2SB1013-TP-34	
Q654	8-729-900-53	TRANSISTOR DTC114EKA-T146	
Q655	8-729-900-53	TRANSISTOR DTC114EKA-T146	
Q656	8-729-202-56	TRANSISTOR 2SA950-Y-TPE2	
Q657	8-729-202-56	TRANSISTOR 2SA950-Y-TPE2	
Q658	8-729-900-53	TRANSISTOR DTC114EKA-T146	
Q659	8-729-900-53	TRANSISTOR DTC114EKA-T146	

MAIN

Ref. No.	Part No.	Description			Remarks
Q661	8-729-040-76	TRANSISTOR	KTA1273-Y-AT		
Q662	8-729-900-53	TRANSISTOR	DTC114EKA-T146		
Q803	8-729-027-44	TRANSISTOR	DTC114TKA-T146		
Q805	8-729-027-44	TRANSISTOR	DTC114TKA-T146		
Q806	8-729-027-44	TRANSISTOR	DTC114TKA-T146		
Q808	8-729-027-44	TRANSISTOR	DTC114TKA-T146		
Q809	8-729-027-44	TRANSISTOR	DTC114TKA-T146		
Q810	8-729-120-28	TRANSISTOR	2SC2412K-T-146-R		
					(AEP,AED,CIS,UK)
Q812	8-729-027-44	TRANSISTOR	DTC114TKA-T146		
Q813	8-729-027-44	TRANSISTOR	DTC114TKA-T146		
Q816	8-729-027-44	TRANSISTOR	DTC114TKA-T146		
					(AEP,AED,CIS,UK)
Q823	8-729-027-44	TRANSISTOR	DTC114TKA-T146		
Q824	8-729-027-44	TRANSISTOR	DTC114TKA-T146		
Q825	8-729-027-44	TRANSISTOR	DTC114TKA-T146		
Q826	8-729-027-44	TRANSISTOR	DTC114TKA-T146		
Q827	8-729-027-44	TRANSISTOR	DTC114TKA-T146		
Q828	8-729-027-44	TRANSISTOR	DTC114TKA-T146		
Q829	8-729-027-23	TRANSISTOR	DTA114EKA-T146		
Q830	8-729-920-31	TRANSISTOR	DTC343TK-T-146		
		< RESISTOR >			
R102	1-216-079-00	METAL CHIP	18K	5%	1/10W
R103	1-216-049-91	RES-CHIP	1K	5%	1/10W
R105	1-216-071-00	METAL CHIP	8.2K	5%	1/10W
					(US,CND,MX,E,EA,AR,HK,MY,SP,KR,TW,AUS)
R105	1-216-061-00	METAL CHIP	3.3K	5%	1/10W
					(AEP,AED,CIS,UK)
R106	1-216-061-00	METAL CHIP	3.3K	5%	1/10W
R107	1-216-071-00	METAL CHIP	8.2K	5%	1/10W
R108	1-216-072-00	METAL CHIP	9.1K	5%	1/10W
R109	1-216-049-91	RES-CHIP	1K	5%	1/10W
					(US,CND,MX,E,EA,AR,HK,MY,SP,KR,TW,AUS)
R109	1-216-057-00	METAL CHIP	2.2K	5%	1/10W
					(AEP,AED,CIS,UK)
R110	1-216-069-00	METAL CHIP	6.8K	5%	1/10W
R111	1-216-049-91	RES-CHIP	1K	5%	1/10W
R112	1-216-049-91	RES-CHIP	1K	5%	1/10W
					(US,CND,MX,E,EA,AR,HK,MY,SP,KR,TW,AUS)
R112	1-216-043-91	RES-CHIP	560	5%	1/10W
					(AEP,AED,CIS,UK)
R113	1-216-089-91	RES-CHIP	47K	5%	1/10W
R114	1-216-055-00	METAL CHIP	1.8K	5%	1/10W
R115	1-216-067-00	METAL CHIP	5.6K	5%	1/10W
R116	1-216-061-00	METAL CHIP	3.3K	5%	1/10W
R117	1-216-089-91	RES-CHIP	47K	5%	1/10W
R118	1-216-089-91	RES-CHIP	47K	5%	1/10W
R119	1-216-051-00	METAL CHIP	1.2K	5%	1/10W
					(US,CND,MX,E,EA,AR,HK,MY,SP,KR,TW,AUS)
R119	1-216-043-91	RES-CHIP	560	5%	1/10W
					(AEP,AED,CIS,UK)
R120	1-216-073-00	METAL CHIP	10K	5%	1/10W
R121	1-216-049-91	RES-CHIP	1K	5%	1/10W
R122	1-216-025-91	RES-CHIP	100	5%	1/10W
R123	1-216-045-00	METAL CHIP	680	5%	1/10W
R124	1-216-081-00	METAL CHIP	22K	5%	1/10W
R125	1-216-091-00	METAL CHIP	56K	5%	1/10W
R126	1-216-097-91	RES-CHIP	100K	5%	1/10W
R129	1-216-073-00	METAL CHIP	10K	5%	1/10W
R130	1-216-073-00	METAL CHIP	10K	5%	1/10W

Ref. No.	Part No.	Description			Remarks
R131	1-216-053-00	METAL CHIP	1.5K	5%	1/10W
R133	1-216-049-91	RES-CHIP	1K	5%	1/10W
R134	1-216-025-91	RES-CHIP	100	5%	1/10W
R136	1-216-049-91	RES-CHIP	1K	5%	1/10W
R137	1-216-053-00	METAL CHIP	1.5K	5%	1/10W
R138	1-216-073-00	METAL CHIP	10K	5%	1/10W
R139	1-216-296-91	SHORT	0		
R202	1-216-079-00	METAL CHIP	18K	5%	1/10W
R203	1-216-049-91	RES-CHIP	1K	5%	1/10W
R205	1-216-071-00	METAL CHIP	8.2K	5%	1/10W
					(US,CND,MX,E,EA,AR,HK,MY,SP,TW,AUS,KR)
R205	1-216-061-00	METAL CHIP	3.3K	5%	1/10W
					(AEP,AED,CIS,UK)
R206	1-216-061-00	METAL CHIP	3.3K	5%	1/10W
R207	1-216-071-00	METAL CHIP	8.2K	5%	1/10W
R208	1-216-072-00	METAL CHIP	9.1K	5%	1/10W
R209	1-216-049-91	RES-CHIP	1K	5%	1/10W
					(US,CND,MX,E,EA,AR,HK,MY,SP,KR,TW,AUS)
R209	1-216-057-00	METAL CHIP	2.2K	5%	1/10W
					(AEP,AED,CIS,UK)
R210	1-216-069-00	METAL CHIP	6.8K	5%	1/10W
R211	1-216-049-91	RES-CHIP	1K	5%	1/10W
R212	1-216-049-91	RES-CHIP	1K	5%	1/10W
					(US,CND,MX,E,EA,AR,HK,MY,SP,KR,TW,AUS)
R212	1-216-043-91	RES-CHIP	560	5%	1/10W
					(AEP,AED,CIS,UK)
R213	1-216-089-91	RES-CHIP	47K	5%	1/10W
R214	1-216-055-00	METAL CHIP	1.8K	5%	1/10W
R215	1-216-067-00	METAL CHIP	5.6K	5%	1/10W
R216	1-216-061-00	METAL CHIP	3.3K	5%	1/10W
R217	1-216-089-91	RES-CHIP	47K	5%	1/10W
R218	1-216-089-91	RES-CHIP	47K	5%	1/10W
R219	1-216-051-00	METAL CHIP	1.2K	5%	1/10W
					(US,CND,MX,E,EA,AR,HK,MY,SP,KR,TW,AUS)
R219	1-216-043-91	RES-CHIP	560	5%	1/10W
					(AEP,AED,CIS,UK)
R220	1-216-073-00	METAL CHIP	10K	5%	1/10W
R221	1-216-049-91	RES-CHIP	1K	5%	1/10W
R222	1-216-025-91	RES-CHIP	100	5%	1/10W
R223	1-216-045-00	METAL CHIP	680	5%	1/10W
R224	1-216-081-00	METAL CHIP	22K	5%	1/10W
R225	1-216-091-00	METAL CHIP	56K	5%	1/10W
R226	1-216-097-91	RES-CHIP	100K	5%	1/10W
R229	1-216-073-00	METAL CHIP	10K	5%	1/10W
R230	1-216-073-00	METAL CHIP	10K	5%	1/10W
R231	1-216-053-00	METAL CHIP	1.5K	5%	1/10W
R233	1-216-049-91	RES-CHIP	1K	5%	1/10W
R234	1-216-025-91	RES-CHIP	100	5%	1/10W
R236	1-216-049-91	RES-CHIP	1K	5%	1/10W
R237	1-216-053-00	METAL CHIP	1.5K	5%	1/10W
R238	1-216-073-00	METAL CHIP	10K	5%	1/10W
R239	1-216-296-91	SHORT	0		
R301	1-216-043-91	RES-CHIP	560	5%	1/10W
					(EA,HK,MY,SP,TW)
R301	1-216-047-91	RES-CHIP	820	5%	1/10W
					(US,CND,AEP,UK,E,AED,CIS,MX,AR,AUS,KR)
R303	1-216-035-00	METAL CHIP	270	5%	1/10W
R306	1-216-001-00	METAL CHIP	10	5%	1/10W
R307	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R308	1-216-041-00	METAL CHIP	470	5%	1/10W

Ref. No.	Part No.	Description			Remarks
R309	1-216-081-00	METAL CHIP	22K	5%	1/10W
R310	1-216-073-00	METAL CHIP	10K	5%	1/10W
R311	1-216-073-00	METAL CHIP	10K	5%	1/10W
R314	1-216-047-91	RES-CHIP	820	5%	1/10W
R316	1-216-033-00	METAL CHIP	220	5%	1/10W
R317	1-216-053-00	METAL CHIP	1.5K	5%	1/10W
R321	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R325	1-216-089-91	RES-CHIP	47K	5%	1/10W
R325	1-216-089-91	RES-CHIP	47K	5%	1/10W
R326	1-216-089-91	RES-CHIP	47K	5%	1/10W
R350	1-216-043-91	RES-CHIP	560	5%	1/10W
					(EA,HK,MY,SP,TW)
R350	1-216-047-91	RES-CHIP	820	5%	1/10W
					(US,CND,AEP,UK,E,AED,CIS,MX,AR,AUS,KR)
R351	1-216-089-91	RES-CHIP	47K	5%	1/10W
R352	1-216-073-00	METAL CHIP	10K	5%	1/10W
					(US,CND,AEP,UK,E,AED,CIS,MX,AR,AUS,KR)
R391	1-216-089-91	RES-CHIP	47K	5%	1/10W
R392	1-216-089-91	RES-CHIP	47K	5%	1/10W
					(US,CND,AEP,UK,E,AED,CIS,MX,AR,AUS,KR)
R393	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
					(US,CND,AEP,UK,E,AED,CIS,MX,AR,AUS,KR)
R394	1-216-089-91	RES-CHIP	47K	5%	1/10W
					(US,CND,AEP,UK,E,AED,CIS,MX,AR,AUS,KR)
R395	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
					(US,CND,AEP,UK,E,AED,CIS,MX,AR,AUS,KR)
R397	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
					(US,CND,AEP,UK,E,AED,CIS,MX,AR,AUS,KR)
R398	1-216-105-91	RES-CHIP	220K	5%	1/10W
					(US,CND,AEP,UK,E,AED,CIS,MX,AR,AUS,KR)
R622	1-216-097-91	RES-CHIP	100K	5%	1/10W
R624	1-216-097-91	RES-CHIP	100K	5%	1/10W
R627	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R628	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R629	1-216-057-00	METAL CHIP	2.2K	5%	1/10W
					(US,CND,MX,E,EA,AR,HK,MY,SP,KR,TW,AUS)
R629	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
					(AEP,AED,CIS,UK)
R630	1-216-027-00	METAL CHIP	120	5%	1/10W
R631	1-216-037-00	METAL CHIP	330	5%	1/10W
R633	1-216-097-91	RES-CHIP	100K	5%	1/10W
R637	1-216-035-00	METAL CHIP	270	5%	1/10W
					(AEP,AED,CIS,UK)
R638	1-216-073-00	METAL CHIP	10K	5%	1/10W
R639	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R650	1-216-049-91	RES-CHIP	1K	5%	1/10W
R651	1-216-049-91	RES-CHIP	1K	5%	1/10W
R652	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R653	1-216-089-91	RES-CHIP	47K	5%	1/10W
R654	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R655	1-216-049-91	RES-CHIP	1K	5%	1/10W
R656	1-216-049-91	RES-CHIP	1K	5%	1/10W
R657	1-216-017-91	RES-CHIP	47	5%	1/10W
R658	1-216-049-91	RES-CHIP	1K	5%	1/10W
R659	1-216-049-91	RES-CHIP	1K	5%	1/10W
R670	1-216-097-91	RES-CHIP	100K	5%	1/10W
					(AEP,AED,CIS,UK)
R671	1-216-113-00	METAL CHIP	470K	5%	1/10W
					(AEP,AED,CIS,UK)
R672	1-216-049-91	RES-CHIP	1K	5%	1/10W
					(AEP,AED,CIS,UK)
R673	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
					(AEP,AED,CIS,UK)
R674	1-216-089-91	RES-CHIP	47K	5%	1/10W
					(AEP,AED,CIS,UK)
R675	1-216-093-91	RES-CHIP	68K	5%	1/10W
					(AEP,AED,CIS,UK)
R691	1-216-089-91	RES-CHIP	47K	5%	1/10W
R692	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R800	1-216-049-91	RES-CHIP	1K	5%	1/10W
R801	1-216-049-91	RES-CHIP	1K	5%	1/10W
R802	1-216-049-91	RES-CHIP	1K	5%	1/10W
R803	1-216-049-91	RES-CHIP	1K	5%	1/10W
R804	1-216-049-91	RES-CHIP	1K	5%	1/10W
R805	1-216-049-91	RES-CHIP	1K	5%	1/10W
R806	1-216-049-91	RES-CHIP	1K	5%	1/10W
R807	1-216-049-91	RES-CHIP	1K	5%	1/10W
R808	1-216-049-91	RES-CHIP	1K	5%	1/10W
R809	1-216-049-91	RES-CHIP	1K	5%	1/10W
R810	1-216-049-91	RES-CHIP	1K	5%	1/10W
R811	1-216-049-91	RES-CHIP	1K	5%	1/10W
R812	1-216-049-91	RES-CHIP	1K	5%	1/10W
R813	1-216-049-91	RES-CHIP	1K	5%	1/10W
R814	1-216-049-91	RES-CHIP	1K	5%	1/10W
R815	1-216-049-91	RES-CHIP	1K	5%	1/10W
R816	1-216-049-91	RES-CHIP	1K	5%	1/10W
R817	1-216-049-91	RES-CHIP	1K	5%	1/10W
R818	1-216-049-91	RES-CHIP	1K	5%	1/10W
R819	1-216-049-91	RES-CHIP	1K	5%	1/10W
R820	1-216-049-91	RES-CHIP	1K	5%	1/10W
R821	1-216-049-91	RES-CHIP	1K	5%	1/10W
R822	1-216-049-91	RES-CHIP	1K	5%	1/10W
R823	1-216-049-91	RES-CHIP	1K	5%	1/10W
R824	1-216-049-91	RES-CHIP	1K	5%	1/10W
R825	1-216-025-91	RES-CHIP	100	5%	1/10W
R826	1-216-049-91	RES-CHIP	1K	5%	1/10W
R827	1-216-049-91	RES-CHIP	1K	5%	1/10W
R828	1-216-049-91	RES-CHIP	1K	5%	1/10W
R829	1-216-049-91	RES-CHIP	1K	5%	1/10W
R830	1-216-049-91	RES-CHIP	1K	5%	1/10W
R831	1-216-049-91	RES-CHIP	1K	5%	1/10W
R832	1-216-049-91	RES-CHIP	1K	5%	1/10W
R833	1-216-049-91	RES-CHIP	1K	5%	1/10W
R834	1-216-049-91	RES-CHIP	1K	5%	1/10W
R835	1-216-049-91	RES-CHIP	1K	5%	1/10W
R836	1-216-049-91	RES-CHIP	1K	5%	1/10W
R837	1-216-097-91	RES-CHIP	100K	5%	1/10W
R838	1-216-041-00	METAL CHIP	470	5%	1/10W
R839	1-216-013-00	METAL CHIP	33	5%	1/10W
R840	1-216-049-91	RES-CHIP	1K	5%	1/10W
R841	1-216-295-91	SHORT	0		
					(US,CND,E,AR,AUS)
R841	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
					(AEP,UK,AED,CIS)
R841	1-216-053-00	METAL CHIP	1.5K	5%	1/10W
					(EA,HK,MY,SP,TW)

MAIN **POWER**

Ref. No.	Part No.	Description			Remarks
R841	1-216-077-91	RES-CHIP	15K	5%	1/10W (MX)
R841	1-216-275-91	RES-CHIP	1.6M	5%	1/10W (KR)
R842	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R844	1-216-089-91	RES-CHIP	47K	5%	1/10W
R846	1-216-081-00	METAL CHIP	22K	5%	1/10W
R847	1-216-073-00	METAL CHIP	10K	5%	1/10W
R848	1-216-073-00	METAL CHIP	10K	5%	1/10W
R849	1-216-073-00	METAL CHIP	10K	5%	1/10W
R850	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R851	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R852	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R853	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R854	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R855	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R856	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R857	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R858	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R859	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R860	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R861	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R862	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R863	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R864	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R865	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R866	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R867	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R868	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R869	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R870	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R871	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R872	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R873	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R874	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R875	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R876	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R877	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R878	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R879	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R880	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R881	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R882	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R883	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R884	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R885	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R886	1-216-049-91	RES-CHIP	1K	5%	1/10W
R887	1-216-049-91	RES-CHIP	1K	5%	1/10W
R888	1-216-073-00	METAL CHIP	10K	5%	1/10W
R889	1-216-025-91	RES-CHIP	100	5%	1/10W
R890	1-216-065-91	RES-CHIP	4.7K	5%	1/10W
R891	1-216-067-00	METAL CHIP	5.6K	5%	1/10W
R892	1-216-041-00	METAL CHIP	470	5%	1/10W
R894	1-216-049-91	RES-CHIP	1K	5%	1/10W
R895	1-216-049-91	RES-CHIP	1K	5%	1/10W
R896	1-216-049-91	RES-CHIP	1K	5%	1/10W (US,CND,MX,E,EA,AR,HK,MY,SP,KR,TW,AUS)
R896	1-216-065-91	RES-CHIP	4.7K	5%	1/10W (AEP,AED,CIS,UK)
R897	1-216-049-91	RES-CHIP	1K	5%	1/10W
R898	1-216-049-91	RES-CHIP	1K	5%	1/10W
R899	1-216-049-91	RES-CHIP	1K	5%	1/10W
		< VIBRATOR >			
X801	1-767-184-11	VIBRATOR, CERAMIC 4.19MHz			
X802	1-567-098-41	VIBRATOR, CRYSTAL 32.768KHz			
X803	1-579-242-41	VIBRATOR, CRYSTAL 4.332MHz (AEP,AED,CIS,UK)			
**********					
	1-677-145-11	POWER BOARD (AEP,AED,CIS,UK,AUS) **********			
	1-677-145-21	POWER BOARD (E,EA,AR,HK,MY,SP,TW) **********			
	1-677-145-31	POWER BOARD (US,CND,MX) **********			
	1-677-145-41	POWER BOARD (KR) **********			
	1-533-313-11	HOLDER, FUSE			
		< CAPACITOR >			
⚠C901	1-113-925-11	CERAMIC	0.01uF	20.00% 250V (AEP,AED,CIS,US,CND,UK,MX,AUS,KR)	
C907	1-101-005-00	CERAMIC	22000PF	50V	
C908	1-101-005-00	CERAMIC	22000PF	50V	
C909	1-101-005-00	CERAMIC	22000PF	50V	
C910	1-101-005-00	CERAMIC	22000PF	50V	
C911	1-163-063-91	CERAMIC CHIP	0.022uF	10.00% 50V	
C912	1-163-063-91	CERAMIC CHIP	0.022uF	10.00% 50V	
C913	1-163-063-91	CERAMIC CHIP	0.022uF	10.00% 50V	
C914	1-163-063-91	CERAMIC CHIP	0.022uF	10.00% 50V	
		< CONNECTOR >			
CN902	1-766-280-11	PIN, CONNECTOR (PC BOARD) 7P			
		< CONNECTOR >			
CNP901	1-564-321-00	PIN, CONNECTOR 2P			
		< DIODE >			
D901	8-719-053-18	DIODE 1SR154-400TE-25 (AEP,AED,CIS,US,CND,UK,MX,AUS,KR)			
D907	8-719-902-17	DIODE 1N5401			
D908	8-719-902-17	DIODE 1N5401			
D909	8-719-902-17	DIODE 1N5401			
D910	8-719-902-17	DIODE 1N5401			
D911	8-719-046-07	DIODE 2A02M			
D912	8-719-046-07	DIODE 2A02M			
D913	8-719-046-07	DIODE 2A02M			
D914	8-719-046-07	DIODE 2A02M			
		< FUSE >			
⚠F901	1-533-464-11	FUSE, GLASS TUBE (DIA. 5) 0.8A (AEP,AED,CIS,UK,E,EA,AR,HK,MY,SP,KR,TW,AUS)			
⚠F901	1-576-374-11	FUSE, GLASS TUBE 1.25A (US,CND,MX)			
⚠F902	1-533-468-11	FUSE, GLASS TUBE (DIA. 5) 2A (AEP,AED,CIS,UK,E,EA,AR,HK,MY,SP,KR,TW,AUS)			

The components identified by mark ⚠ or dotted line with mark ⚠ are critical for safety. Replace only with part number specified.	Les composants identifiés par une marque ⚠ sont critiques pour la sécurité. Ne les remplacer que par une pièce portant le numéro spécifié.

Ref. No.	Part No.	Description	Remarks
⚠F902	1-576-375-11	FUSE, GLASS TUBE 3.15A (US,CND,MX)	
⚠F903	1-533-468-11	FUSE, GLASS TUBE (DIA. 5) 2A (AEP,AED,CIS,UK,E,EA,AR,HK,MY,SP,KR,TW,AUS)	
⚠F903	1-576-375-11	FUSE, GLASS TUBE 3.15A (US,CND,MX)	
		< RESISTOR >	
⚠R901	1-202-725-00	SOLID 3.3M 10% 1/2W	(US,CND)
		< RELAY >	
⚠RY901	1-755-386-11	RELAY, POWER	(US,CND,AEP,AED,CIS,UK,AUS,MX,KR)
		< SWITCH >	
⚠S901	1-552-921-00	SWITCH, POWER (VOLTAGE SELECTOR)	(E,EA,AR,HK,MY,SP,TW)
		< TRANSFORMER >	
⚠T901	1-435-386-11	TRANSFORMER, POWER	(AEP,AED,CIS,UK,AUS,KR)
⚠T901	1-435-385-11	TRANSFORMER, POWER (US,CND,MX)	
⚠T901	1-435-101-11	TRANSFORMER, POWER	(E,EA,AR,HK,MY,SP,TW)
**********			
	1-677-146-11	SPEAKER BOARD **********	
		< CAPACITOR >	
C127	1-130-495-00	MYLAR 0.1uF 5%	50V
C133	1-130-495-00	MYLAR 0.1uF 5%	50V
C227	1-130-495-00	MYLAR 0.1uF 5%	50V
C233	1-130-495-00	MYLAR 0.1uF 5%	50V
		< CONNECTOR >	
* CN301	1-573-455-11	PLUG, CONNECTOR (2.5MM) 4P	
		< COIL >	
L101	1-420-872-00	COIL, AIR-CORE	
L201	1-420-872-00	COIL, AIR-CORE	
		< RESISTOR >	
R127	1-216-150-91	RES-CHIP 10 5%	1/8W
R141	1-216-150-91	RES-CHIP 10 5%	1/8W
R227	1-216-150-91	RES-CHIP 10 5%	1/8W
R241	1-216-150-91	RES-CHIP 10 5%	1/8W

Ref. No.	Part No.	Description	Remarks
		< TERMINAL >	
* SJ301	1-536-708-41	TERMINAL BOARD, PUSH 4P (SPEAKER)	
**********			
		MISCELLANEOUS **********	
1	1-772-001-11	DECK,MECHANICAL (TAPE DECK BLOCK)	
60	1-792-413-11	WIRE(FLAT TYPE) 18CORE	
61	1-792-413-11	WIRE(FLAT TYPE) 20CORE	
⚠112	1-696-169-11	CORD, POWER	(AEP,AED,CIS,UK,EA,HK,MY,SP,TW)
⚠112	1-696-848-41	CORD, POWER (AUS)	
⚠112	1-769-079-21	CORD, POWER (KR)	
⚠112	1-775-789-91	CORD, POWER (MX,E)	
⚠112	1-783-820-11	CORD, POWER (US,CND)	
⚠112	1-783-941-21	CORD, POWER (AR)	
⚠113	1-770-019-11	ADAPTOR, CONVERSION PLUG 3P (UK,HK)	
⚠113	1-569-008-21	ADAPTOR, CONVERSION PLUG 2P	(EA,MY,SP,TW)
114	1-792-409-11	WIRE (FLAT TYPE) 21CORE	
115	1-792-411-11	WIRE (FLAT TYPE) 19CORE	
116	1-792-412-11	WIRE(FLATTYPE) 20CORE	
117	1-792-413-11	WIRE(FLATTYPE) 18CORE	
118	1-792-410-11	WIRE (FLAT TYPE) 23CORE	
⚠T901	1-435-101-11	TRANSFORMER, POWER	(E,EA,AR,HK,MY,SP,TW)
⚠T901	1-435-385-11	TRANSFORMER, POWER (US,CND,MX)	
⚠T901	1-435-386-11	TRANSFORMER, POWER	(AEP,AED,CIS,UK,AUS,KR)
**********			
		********** HARDWARE LIST **********	
#1	7-685-546-14	SCREW +BTP 3X8 TYPE2 N-S	
#2	7-685-245-19	SCREW +KTP 3X6 TYPE2 NON-SLIT	
#3	7-685-246-14	SCREW +KTP 3X8 TYPE2 NON-SLIT	
#4	7-685-659-14	SCREW +BVTP 4X8 TYPE2 N-S	

The components identified by mark ⚠ or dotted line with mark ⚠ are critical for safety. Replace only with part number specified.	Les composants identifiés par une marque ⚠ sont critiques pour la sécurité. Ne les remplacer que par une pièce portant le numéro spécifié.

MEMO

HCD-CP11

SONY

SERVICE MANUAL

US Model
Canadian Model
AEP Model
UK Model
E Model
Australian Model

SUPPLEMENT-1

File this supplement with the service manual.

Subject: PARTS CHANGE

PARTS CHANGE

The others are common parts so that please refer to the previous issued service manual.

Page	INCORRECT			CORRECT		
	Ref. No.	Part No.	Description	Ref. No.	Part No.	Description
30	1	1-772-001-11	DECK, MECHANICAL (TAPE DECK BLOCK)	1	1-772-623-11	DECK, MECHANICAL (TAPE DECK BLOCK)

(ENG-00002)

9-929-095-81

Sony Corporation
Audio Entertainment Group

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SONY

SERVICE MANUAL

US Model
Canadian Model
AEP Model
UK Model
E Model
Australian Model

SUPPLEMENT-2

File this supplement with the Service Manual.

Subject:
1. COLOR VARIATION (GOLD MODEL) AEP MODEL ONLY ADDITION
2. CD MECHANISM DECK (CDM55D-K5BD41) ADDITION
3. CORRECTION

(SPM-00014)

1. COLOR VARIATION (GOLD MODEL) AEP MODEL ONLY ADDITION

The others are common parts so that please refer to the previous issued service manual.

PAGE	Former				New		
	Ref. No.	Part No.	Description	Remarks	Part No.	Description	Remark
30	2	4-217-341-21	COVER(UPPER)		4-217-341-21	COVER(UPPER) (SILVER)	
		———	———		4-217-341-31	COVER(UPPER) (GOLD)	
31	52	X-4952-728-1	PANEL SUB ASSY, FRONT (AEP,AED,CIS,UK)		X-4952-728-1	PANEL SUB ASSY, FRONT (SILVER)	
		———	———		X-4953-299-1	PANEL SUB ASSY, FRONT (GOLD)	
	53	4-227-956-01	WINDOW (CASSETTE)		4-227-956-01	WINDOW (CASSETTE) (SILVER)	
		———	———		4-222-321-01	WINDOW (CASSETTE) (GOLD)	
	55	4-217-316-01	LID,CASSETTE		4-217-316-01	LID,CASSETTE (SILVER)	
		———	———		4-217-316-11	LID,CASSETTE (GOLD)	
	63	X-4951-107-1	LOCK(EJECT) ASSY		X-4951-107-1	LOCK(EJECT) ASSY (SILVER)	
		———	———		X-4951-937-1	LOCK(EJECT) ASSY (GOLD)	
	69	4-227-282-01	KNOB(BASS)		4-227-282-01	KNOB(BASS) (SILVER)	
		———	———		4-227-282-11	KNOB(BASS) (GOLD)	
32	101	4-227-281-01	LID(CD)		4-227-281-01	LID(CD) (SILVER)	
		———	———		4-231-406-01	LID(CD) (GOLD)	
	107	4-227-293-01	PANEL, BACK (AEP,AED,CIS,UK)		4-227-293-01	PANEL, BACK (SILVER)	
		———	———		4-231-405-01	PANEL, BACK (GOLD)	

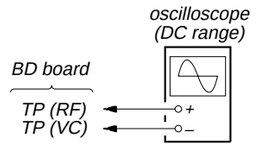
2. CD MECHANISM DECK (CDM55D-K5BD41) ADDITION ELECTRICAL ADJUSTMENT

CD SECTION

Note:

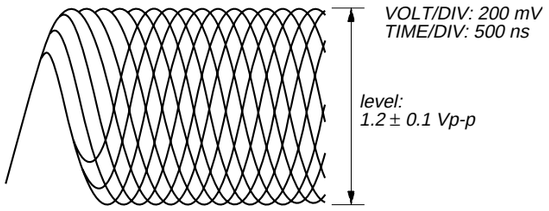
1. CD Block is basically constructed to operate without adjustment.
2. Use YEDS-18 disc (3-702-101-01) unless otherwise indicated.
3. Use an oscilloscope with more than 10 MΩ impedance.
4. Clean the object lens by an applicator with neutral detergent when the signal level is low than specified value with the following checks.
5. Check the focus bias check when optical pick-up block is replaced.

Focus Bias Check



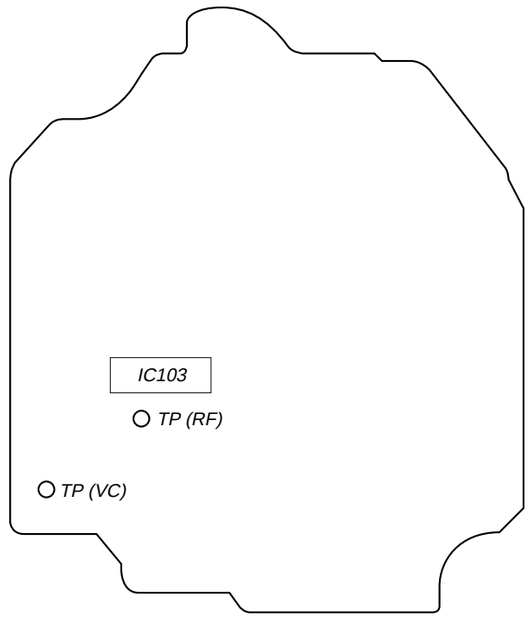
Procedure :

1. Connect oscilloscope to TP (RF) and TP (VC) on the CD board.
2. Press the I/⏻ button to turn the power on, and press the ⏏ (CD) button to open the CD disc tray.
3. Put disc (YEDS-18) in and press the ▶II (CD) button to play-back.
4. Confirm that oscilloscope waveform is as shown in the figure below. (eye pattern)
   A good eye pattern means that the diamond shape (◇) in the center of the waveform can be clearly distinguished.



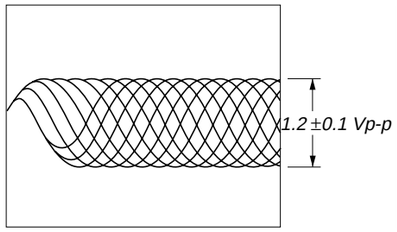
Checking Location:

– CD BOARD (Conductor Side) –

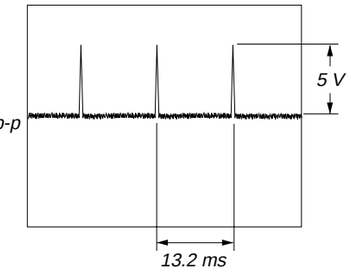


• Waveforms
– CD Board –

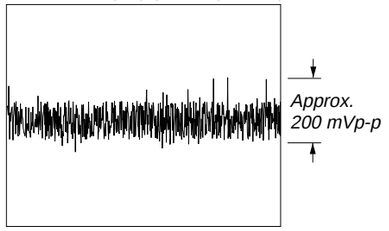
❶ IC103 ⑯ (RFO) (CD Play Mode)



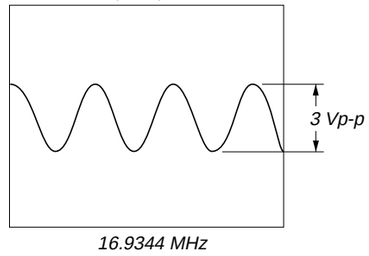
❻ IC101 ⑳ (SCOR) (CD Play Mode)



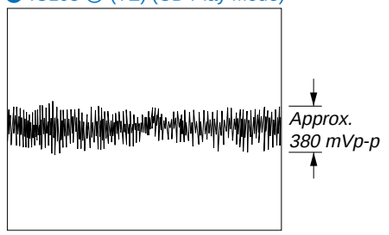
❷ IC103 ⑭ (FE) (CD Play Mode)



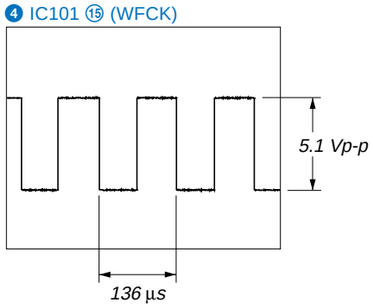
❼ IC101 ㊻ (XTAI)



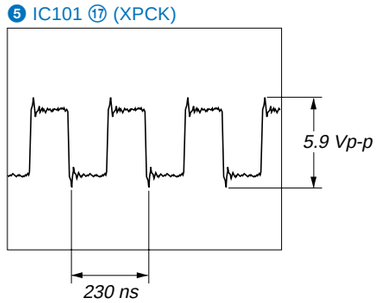
❸ IC103 ⑬ (TE) (CD Play Mode)



❹ IC101 ⑮ (WFCK)



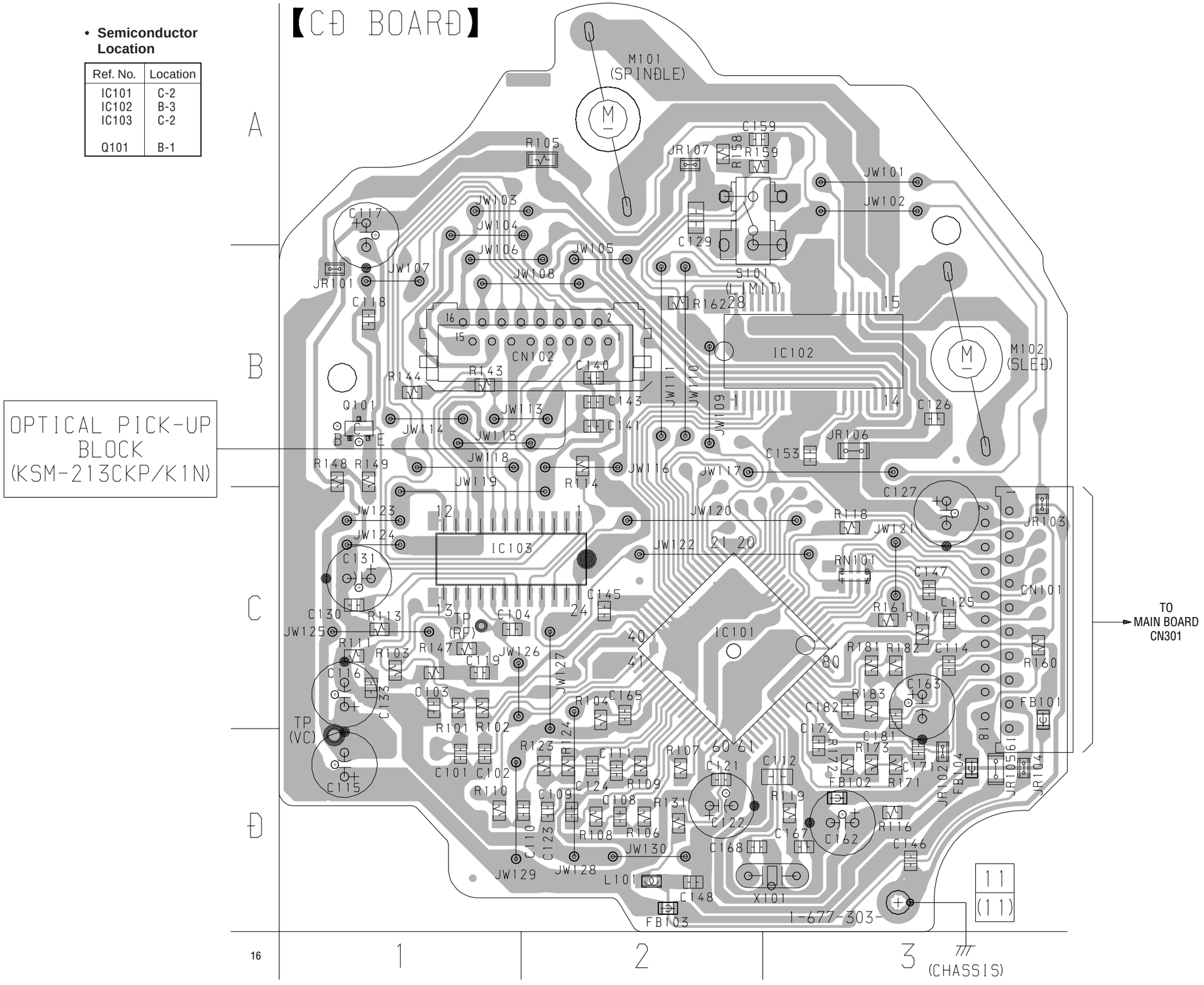
❺ IC101 ⑰ (XPCK)



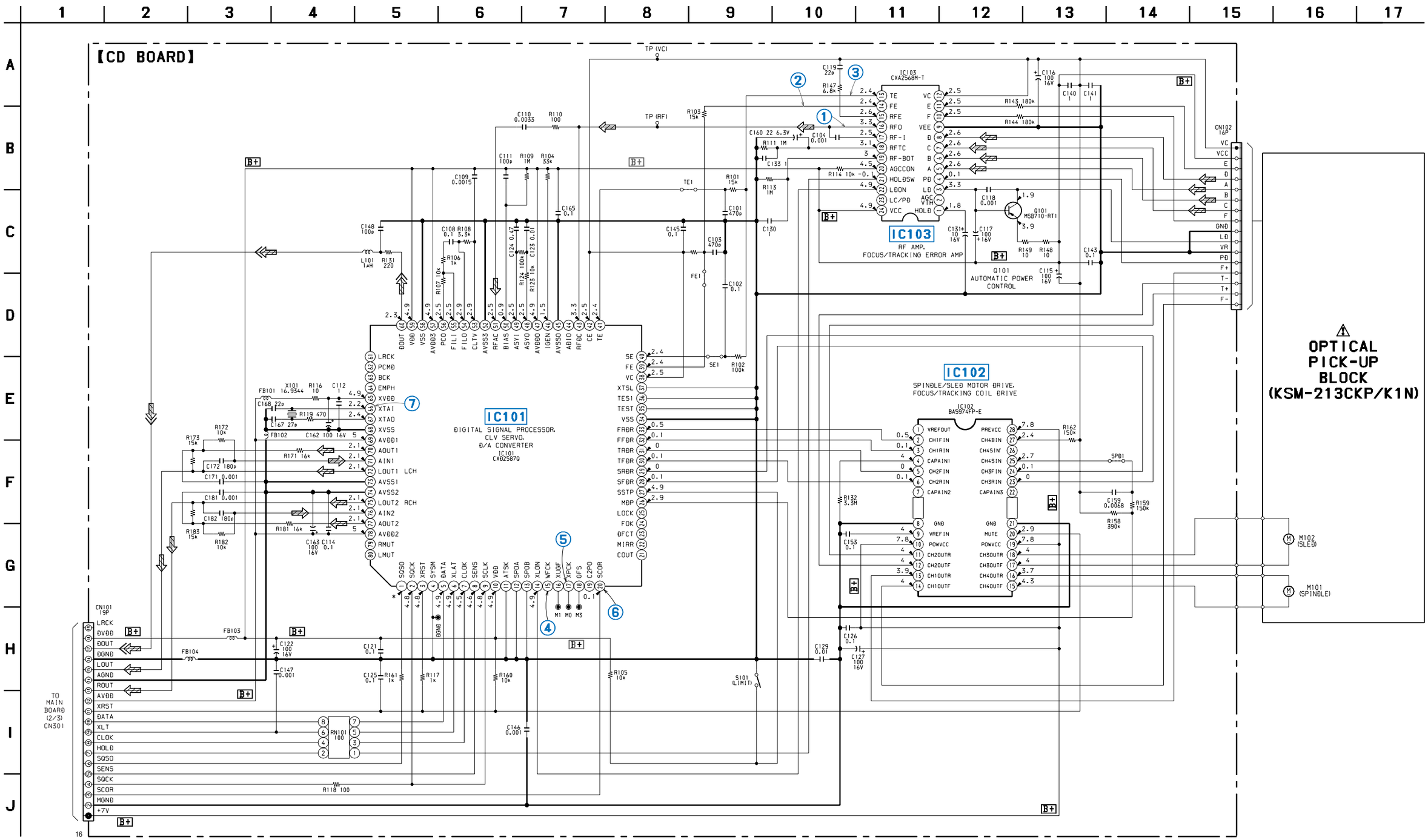
PRINTED WIRING BOARD – CD Board –

- **Semiconductor Location**

Ref. No.	Location
IC101	C-2
IC102	B-3
IC103	C-2
Q101	B-1



SCHEMATIC DIAGRAM – CD Section – • See page 3 for Waveforms. • See page 6 for IC Block Diagrams.



- Voltages and waveforms are dc with respect to ground under no-signal conditions.
  no mark : CD PLAY
  ∗ : Impossible to measure

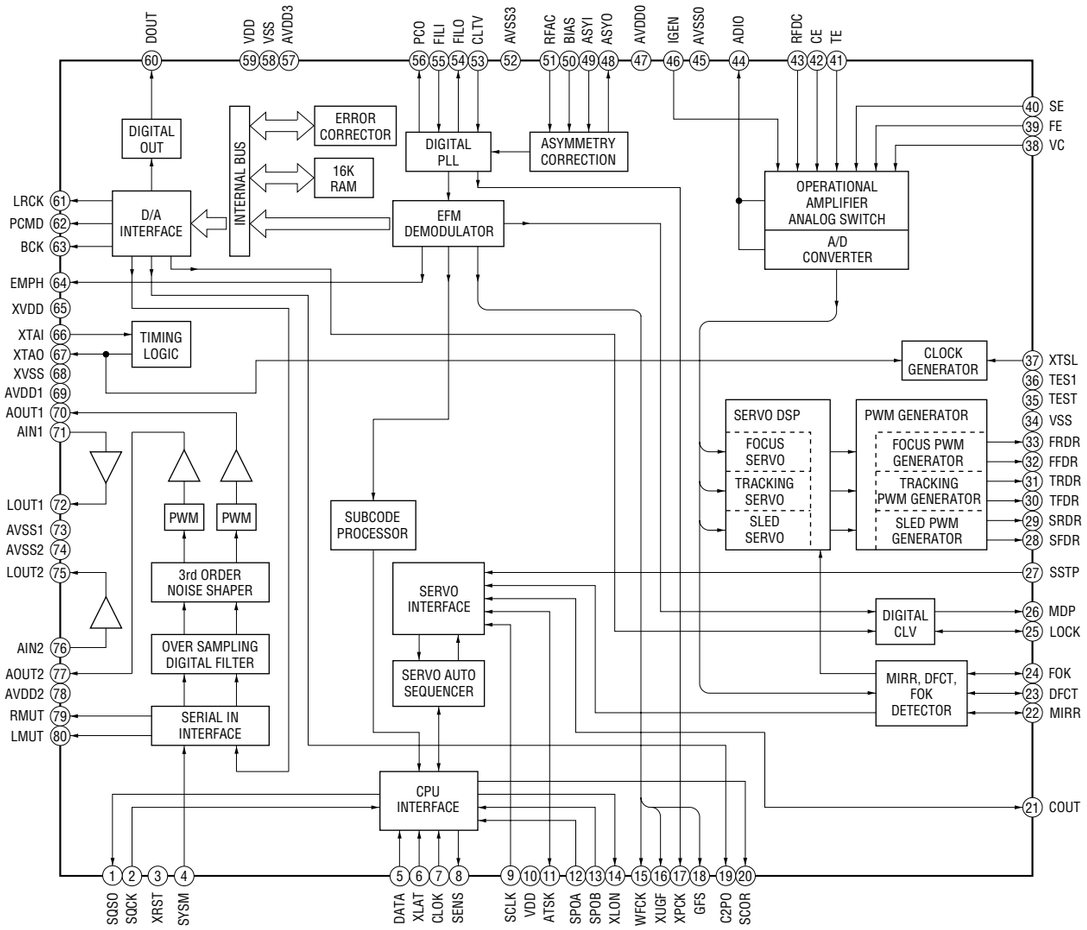
The components identified by mark ⚠ or dotted line with mark ⚠ are critical for safety. Replace only with part number specified.	Les composants identifiés par une marque ⚠ sont critiques pour la sécurité. Ne les remplacer que par une pièce portant le numéro spécifié.

HCD-CP11

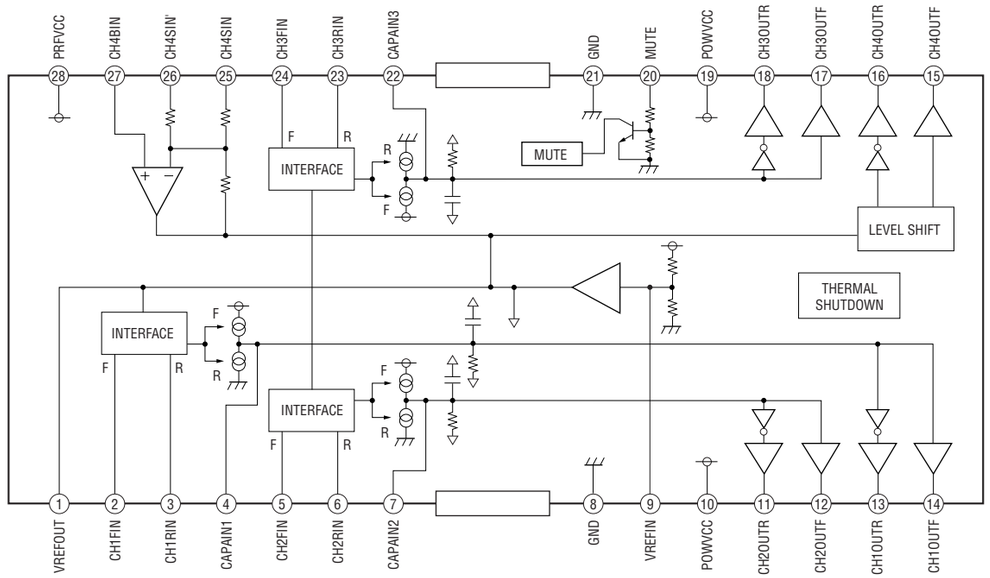
- **IC Block Diagrams**

– CD Board –

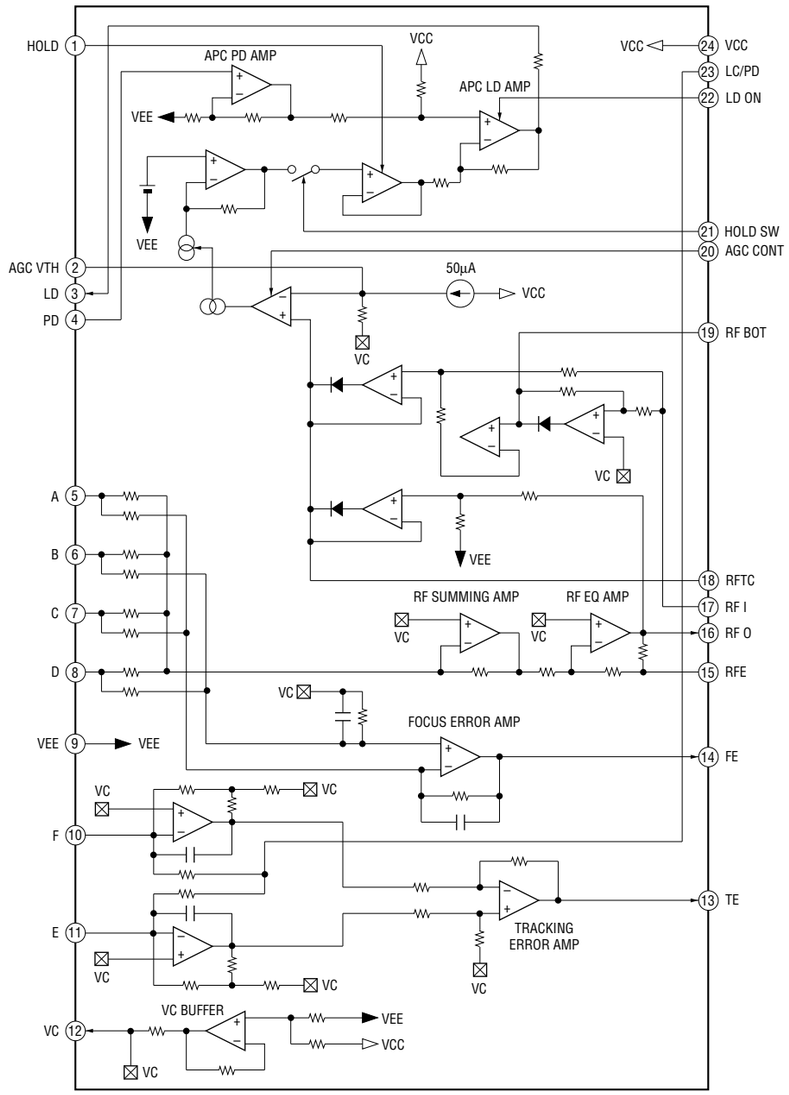
IC101 CXD2587Q



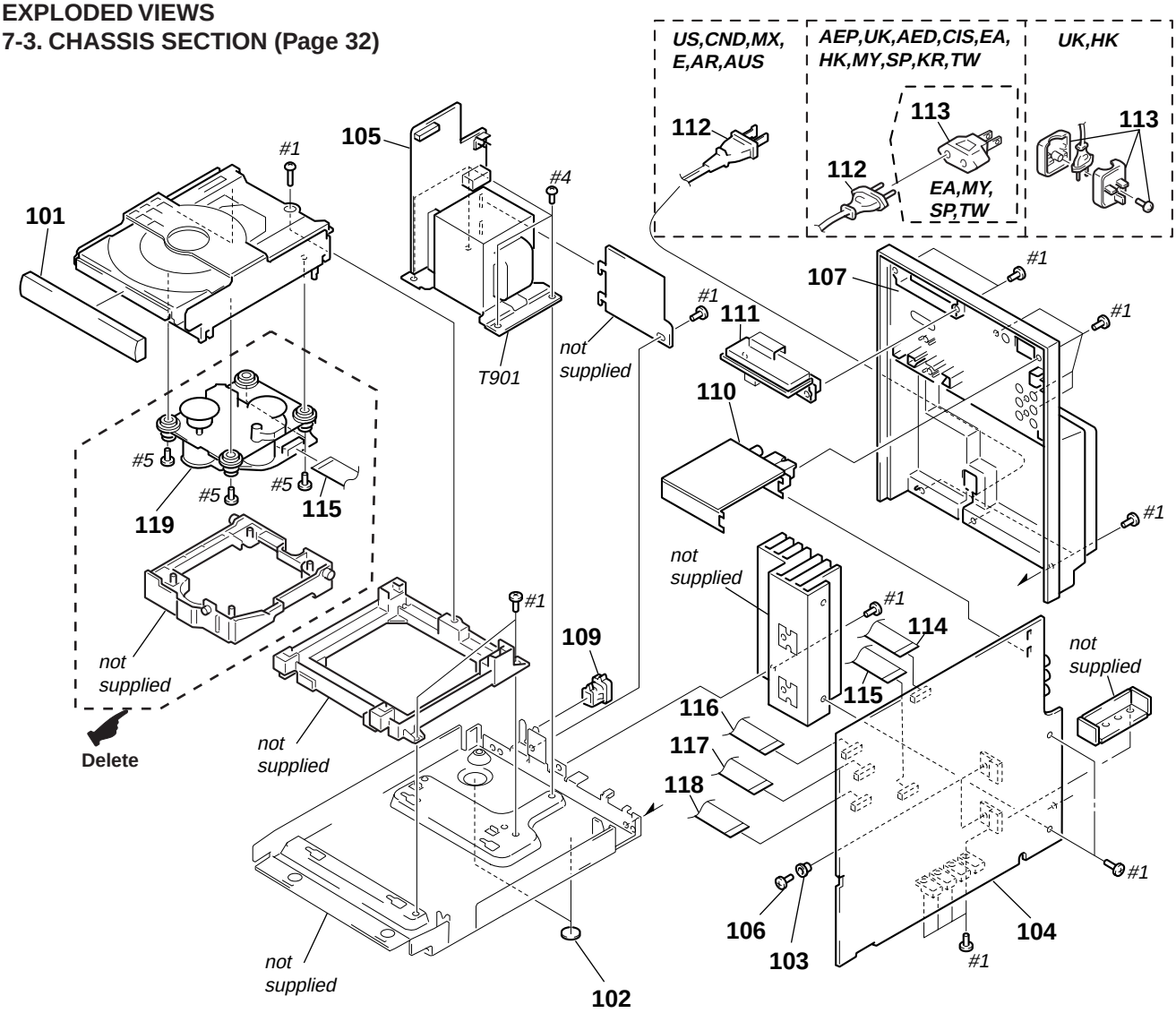
IC102 BA5974FP-E2



IC103 CXA2568M-T6



EXPLODED VIEWS
7-3. CHASSIS SECTION (Page 32)

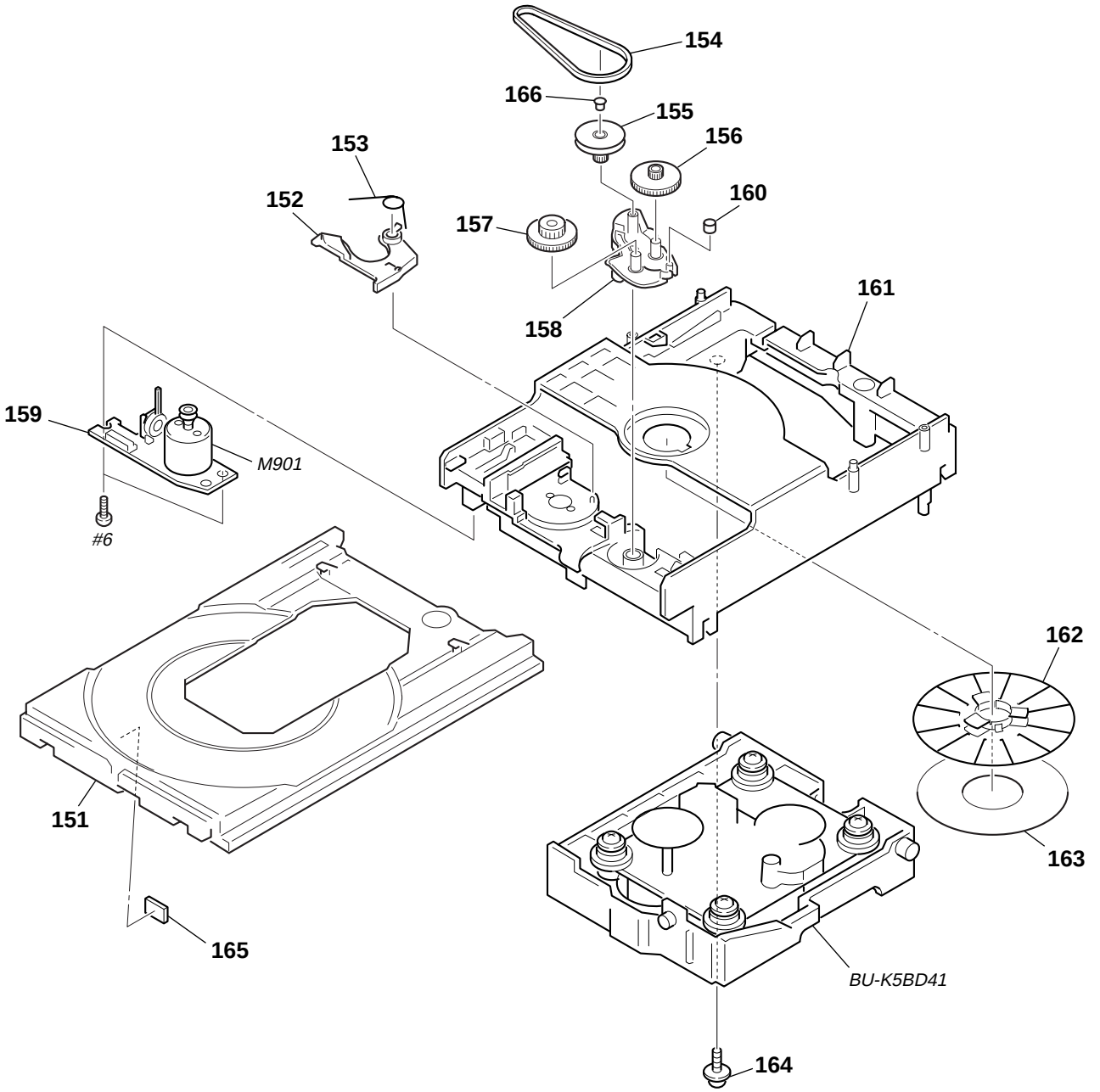


Ref. No.	Part No.	Description	Remarks
101	4-227-281-01	LID(CD)	
102	4-217-355-01	FOOT	
* 103	4-217-354-01	BUSHING, INSULATING	
104	A-4428-920-A	MAIN BOARD, COMPLETE (AEP,AED,CIS,UK)	
104	A-4473-503-A	MAIN BOARD, COMPLETE (MX)	
104	A-4473-505-A	MAIN BOARD, COMPLETE (US,CND)	
104	A-4473-507-A	MAIN BOARD, COMPLETE (EA,HK,MY,SP,TW)	
104	A-4473-512-A	MAIN BOARD, COMPLETE (AUS)	
104	A-4473-513-A	MAIN BOARD, COMPLETE (E,AR)	
104	A-4473-652-A	MAIN BOARD, COMPLETE (KR)	
105	1-677-145-11	POWER BOARD (AEP,AED,CIS,UK,AUS)	
105	1-677-145-21	POWER BOARD (E,EA,AR,HK,MY,SP,TW)	
105	1-677-145-31	POWER BOARD (US,CND,MX)	
105	1-677-145-41	POWER BOARD (KR)	
106	4-931-757-31	SCREW(DIA.2.6X8)(IT3B),TAPPING	
107	4-227-293-01	PANEL, BACK (AEP,AED,CIS,UK)	
107	4-227-293-11	PANEL, BACK (US,CND,MX,KR)	
107	4-227-293-21	PANEL, BACK (E,EA,AR,HK,MY,SP,TW)	
107	4-227-293-41	PANEL, BACK (AUS)	
109	4-217-350-01	STOPPER, CORD (US,CND,MX,E,EA,AR,MY,SP,KR,AUS)	
109	4-217-350-11	STOPPER, CORD (AEP,AED,CIS,UK,HK,TW)	
110	A-4303-600-A	TUNER BLOCK (AED,CIS,AUS)	
110	A-4303-604-A	TUNER BLOCK (MX,E,EA,AR,HK,MY,SP,KR,TW)	

Ref. No.	Part No.	Description	Remarks
110	A-4303-605-A	TUNER BLOCK(US,CND)	
110	A-4303-600-A	TUNER BLOCK(AEP,UK)	
111	1-677-146-11	SPEAKER BOARD	
⚠112	1-696-169-11	CORD, POWER (AEP,AED,CIS,UK,EA,HK,MY,SP,TW)	
⚠112	1-696-848-41	CORD, POWER (AUS)	
⚠112	1-769-079-21	CORD, POWER (KR)	
⚠112	1-775-789-91	CORD, POWER (MX,E)	
⚠112	1-783-820-11	CORD, POWER (US,CND)	
⚠112	1-783-941-21	CORD, POWER (AR)	
⚠113	1-770-019-11	ADAPTOR, CONVERSION PLUG 3P (UK,HK)	
⚠113	1-569-008-21	ADAPTOR, CONVERSION PLUG 2P (EA,MY,SP,TW)	
114	1-792-409-11	WIRE (FLAT TYPE) 21CORE	
115	1-792-411-11	WIRE (FLAT TYPE) 19CORE	
116	1-792-412-11	WIRE (FLATTYPE) 20CORE	
117	1-172-413-11	WIRE (FLATTYPE) 18CORE	
118	1-792-410-11	WIRE (FLAT TYPE) 23CORE	Delete
119	A-4677-289-A	CD BLOCK	
⚠T901	1-435-101-11	TRANSFORMER, POWER (E,EA,AR,HK,MY,SP,TW)	
⚠T901	1-435-385-11	TRANSFORMER, POWER (US,CND,MX)	
⚠T901	1-435-386-11	TRANSFORMER, POWER (AEP,AED,CIS,UK,AUS,KR)	

The components identified by mark ⚠ or dotted line with mark ⚠ are critical for safety. Replace only with part number specified.	Les composants identifiés par une marque ⚠ sont critiques pour la sécurité. Ne les remplacer que par une pièce portant le numéro spécifié.

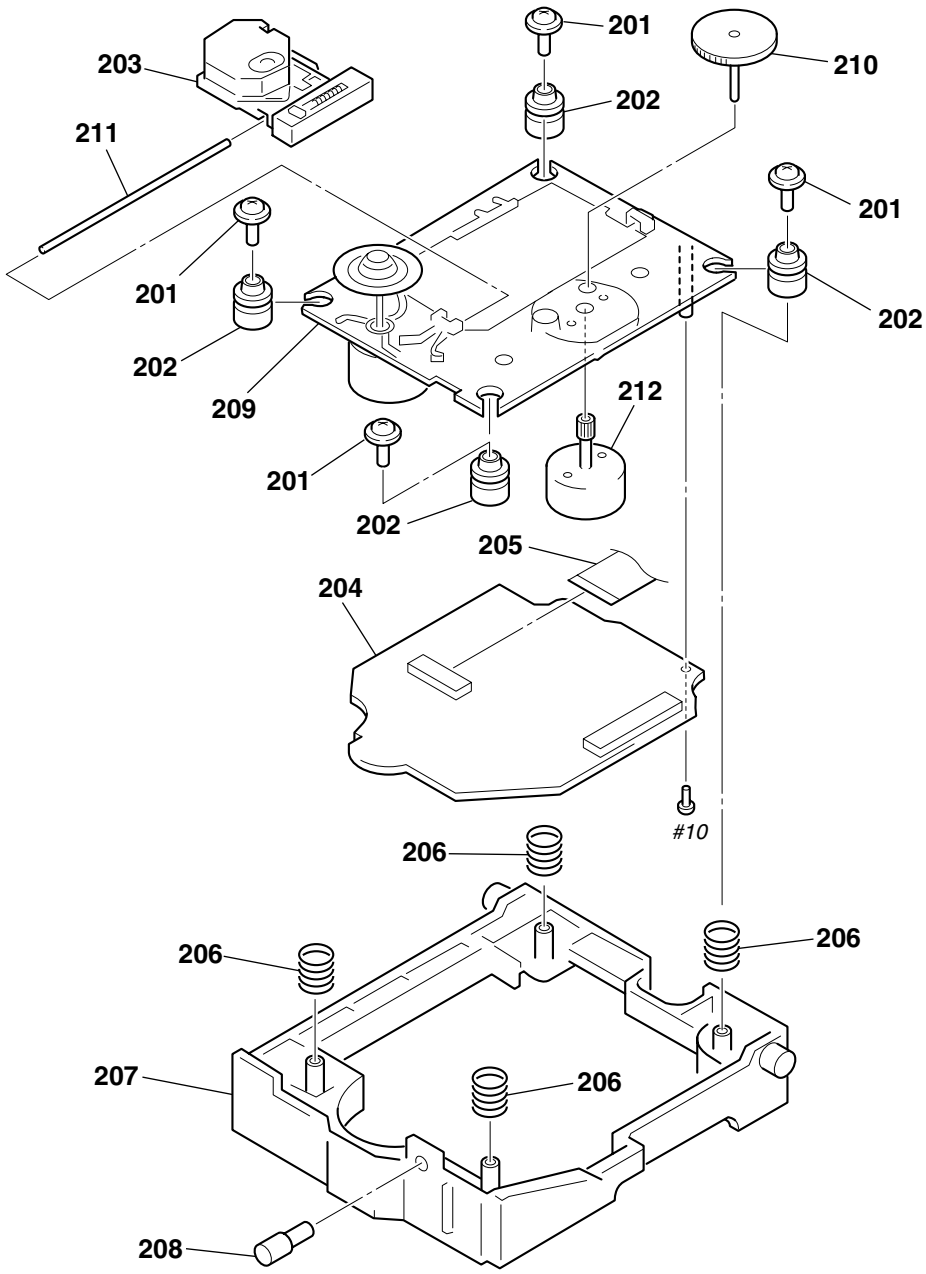
7-4. CD MECHANISM DECK SECTION (Page 33)
(CDM55D-K5BD41)



Ref. No.	Part No.	Description	Remark
151	4-224-894-01	TRAY	
152	4-220-229-01	LEVER (SW)	
153	4-220-239-01	SPRING, TORSION	
154	4-221-816-01	BELT (CDM55)	
155	4-220-234-01	PULLEY (LDG)	
156	4-220-237-01	GEAR (A)	
157	4-220-238-01	GEAR (B)	
158	4-220-233-01	CAM (CDM55)	
159	1-676-599-11	LOADING BOARD	

Ref. No.	Part No.	Description	Remark
160	4-221-815-01	ROLLER	
161	4-225-884-01	CHASSIS (55D)	
162	X-4952-811-1	PULLEY (AT) ASSY	
163	4-220-951-02	SHEET (KH)	
164	4-985-672-01	SCREW (+PTPWHM2.6), FLOATING	
165	4-925-315-31	DAMPER	
166	4-227-598-01	SPACER (55)	
M901	A-4672-891-A	MOTOR (LD) ASSY (LOADING)	

BASE UNIT SECTION (NEW)
(BU-K5BD41)



Ref. No.	Part No.	Description	Remark
201	4-985-672-01	SCREW (+PTPWHM2.6), FLOATING	
202	4-229-005-01	INSULATOR	
⚠203	8-848-483-05	OPTICAL PICK-UP KSM-213CKP/K1N	
204	A-4725-097-A	CD BOARD, COMPLETE	
205	1-791-495-11	WIRE, PARALLEL (FFC)(16 CORE)	
206	4-229-004-01	SPRING, COMPRESSION	
207	4-227-251-01	HOLDER (KSM)	
208	4-221-817-02	SHAFT (BU)	
209	X-2161-737-2	CHASSIS ASSY (CK), MOTOR	
210	2-626-907-01	GEAR (A)(S)	
211	2-626-908-01	SHAFT (S), SLED	
212	X-2625-769-1	GEAR ASSY (MB)(RP), MOTOR	
#10	7-621-255-32	SCREW +P2X5	

The components identified by mark ⚠ or dotted line with mark ⚠ are critical for safety. Replace only with part number specified.	Les composants identifiés par une marque ⚠ sont critiques pour la sécurité. Ne les remplacer que par une pièce portant le numéro spécifié.

ELECTRICAL PARTS LIST

NOTE:

- Due to standardization, replacements in the parts list may be different from the parts specified in the diagrams or the components used on the set.
- -XX, -X mean standardized parts, so they may have some difference from the original one.
- Items marked "*" are not stocked since they are seldom required for routine service. Some delay should be anticipated when ordering these items.
- CAPACITORS:
  uF: µF
- RESISTORS
  All resistors are in ohms.
  METAL: metal-film resistor
  METAL OXIDE: Metal Oxide-film resistor
  F: nonflammable
- COILS
  uH: µH
- SEMICONDUCTORS
  In each case, u: µ, for example:
  uA...: µA... , uPA... , µPA... ,
  uPB... , µPB... , uPC... , µPC... ,
  uPD..., µPD...

When indicating parts by reference number, please include the board name.

Ref. No.	Part No.	Description			Remarks
	A-4725-097-A	CD BOARD, COMPLETE			
		**********			
	1-791-495-11	WIRE, PARALLEL (FFC) (16 CORE)			
		< CAPACITOR >			
C101	1-163-005-11	CERAMIC CHIP	470PF	10%	50V
C102	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C103	1-163-005-11	CERAMIC CHIP	470PF	10%	50V
C104	1-163-009-11	CERAMIC CHIP	0.001uF	10%	50V
C108	1-164-004-11	CERAMIC CHIP	0.1uF	10%	25V
C109	1-163-011-11	CERAMIC CHIP	0.0015uF	10%	50V
C110	1-164-182-11	CERAMIC CHIP	0.0033uF	10%	50V
C111	1-163-251-11	CERAMIC CHIP	100PF	5%	50V
C112	1-107-682-11	CERAMIC CHIP	1uF	10%	16V
C114	1-163-038-00	CERAMIC CHIP	0.1uF		25V
C115	1-126-382-11	ELECT	100uF	20%	16V
C116	1-126-382-11	ELECT	100uF	20%	16V
C117	1-126-382-11	ELECT	100uF	20%	16V
C118	1-163-009-11	CERAMIC CHIP	0.001uF	10%	50V
C119	1-163-235-11	CERAMIC CHIP	22PF	5%	50V
C121	1-163-038-00	CERAMIC CHIP	0.1uF		25V
C122	1-126-382-11	ELECT	100uF	20%	16V
C123	1-163-021-11	CERAMIC CHIP	0.01uF	10%	50V
C124	1-107-823-11	CERAMIC CHIP	0.47uF	10%	16V
C125	1-163-038-00	CERAMIC CHIP	0.1uF		25V
C126	1-163-038-00	CERAMIC CHIP	0.1uF		25V
C127	1-126-382-11	ELECT	100uF	20%	16V
C129	1-163-059-00	CERAMIC CHIP	0.01uF	10%	50V
C130	1-164-346-11	CERAMIC CHIP	1uF		16V
C131	1-124-233-11	ELECT	10uF	20%	16V
C133	1-164-346-11	CERAMIC CHIP	1uF		16V
C140	1-164-346-11	CERAMIC CHIP	1uF		16V
C141	1-164-346-11	CERAMIC CHIP	1uF		16V
C143	1-163-038-00	CERAMIC CHIP	0.1uF		25V
C145	1-163-038-00	CERAMIC CHIP	0.1uF		25V
C146	1-163-009-11	CERAMIC CHIP	0.001uF	10%	50V
C147	1-163-009-11	CERAMIC CHIP	0.001uF	10%	50V
C148	1-163-251-11	CERAMIC CHIP	100PF	5%	50V
C153	1-163-038-00	CERAMIC CHIP	0.1uF		25V
C159	1-163-019-00	CERAMIC CHIP	0.0068uF	10%	50V
C160	1-124-257-00	ELECT	2.2uF	20%	50V
C162	1-126-382-11	ELECT	100uF	20%	16V
C163	1-126-382-11	ELECT	100uF	20%	16V
C165	1-163-038-00	CERAMIC CHIP	0.1uF		25V
C167	1-163-237-11	CERAMIC CHIP	27PF	5%	50V
C168	1-163-235-11	CERAMIC CHIP	22PF	5%	50V
C171	1-163-009-11	CERAMIC CHIP	0.001uF	10%	50V
C172	1-163-123-00	CERAMIC CHIP	180PF	5%	50V
C181	1-163-009-11	CERAMIC CHIP	0.001uF	10%	50V
C182	1-163-123-00	CERAMIC CHIP	180PF	5%	50V
		< CONNECTOR >			
CN101	1-691-078-41	HOUSING, CONNECTOR 19P			
CN102	1-785-953-11	CONNECTOR, FFC/FPC			
		< FERRITE BEAD >			
FB101	1-469-144-21	FERRITE	0uH		
FB102	1-469-144-21	FERRITE	0uH		
FB103	1-469-144-21	FERRITE	0uH		
FB104	1-469-144-21	FERRITE	0uH		
		< IC >			
IC101	8-752-386-85	IC CXD2587Q			
IC102	8-759-549-28	IC BA5974FP-E2			
IC103	8-752-085-51	IC CXA2568M-T6			
		< SHORT >			
JR101	1-216-295-00	SHORT	0		
JR102	1-216-295-00	SHORT	0		
JR103	1-216-295-00	SHORT	0		
JR104	1-216-295-00	SHORT	0		
JR105	1-216-296-00	SHORT	0		
JR106	1-216-296-00	SHORT	0		
JR107	1-216-295-00	SHORT	0		
		< COIL >			
L101	1-410-993-11	INDUCTOR CHIP	1uH		
		< TRANSISTOR >			
Q101	8-729-010-08	TRANSISTOR	MSB710-R		
		< RESISTOR >			
R101	1-216-077-00	RES-CHIP	15K	5%	1/10W
R102	1-216-097-00	RES-CHIP	100K	5%	1/10W
R103	1-216-077-00	RES-CHIP	15K	5%	1/10W
R104	1-216-085-00	METAL CHIP	33K	5%	1/10W
R105	1-216-222-00	RES-CHIP	10K	5%	1/8W
R106	1-216-049-11	RES-CHIP	1K	5%	1/10W
R107	1-216-073-00	METAL CHIP	10K	5%	1/10W
R108	1-216-061-00	METAL CHIP	3.3K	5%	1/10W
R109	1-216-121-00	RES-CHIP	1M	5%	1/10W
R110	1-216-025-00	RES-CHIP	100	5%	1/10W

Ref. No.	Part No.	Description			Remarks
R111	1-216-121-00	RES-CHIP	1M	5%	1/10W
R113	1-216-121-00	RES-CHIP	1M	5%	1/10W
R114	1-216-073-00	METAL CHIP	10K	5%	1/10W
R116	1-216-001-00	METAL CHIP	10	5%	1/10W
R117	1-216-049-11	RES-CHIP	1K	5%	1/10W
R118	1-216-025-00	RES-CHIP	100	5%	1/10W
R119	1-216-041-00	METAL CHIP	470	5%	1/10W
R123	1-216-073-00	METAL CHIP	10K	5%	1/10W
R124	1-216-097-00	RES-CHIP	100K	5%	1/10W
R131	1-216-025-00	RES-CHIP	100	5%	1/10W
R132	1-216-133-00	METAL CHIP	3.3M	5%	1/10W
R143	1-216-103-00	METAL CHIP	180K	5%	1/10W
R144	1-216-103-00	METAL CHIP	180K	5%	1/10W
R147	1-216-069-00	METAL CHIP	6.8K	5%	1/10W
R148	1-216-001-00	METAL CHIP	10	5%	1/10W
R149	1-216-001-00	METAL CHIP	10	5%	1/10W
R158	1-216-111-00	METAL CHIP	390K	5%	1/10W
R159	1-216-101-00	METAL CHIP	150K	5%	1/10W
R160	1-216-073-00	METAL CHIP	10K	5%	1/10W
R161	1-216-049-11	RES-CHIP	1K	5%	1/10W
R162	1-216-101-00	METAL CHIP	150K	5%	1/10W
R171	1-216-078-00	RES-CHIP	16K	5%	1/10W
R172	1-216-073-00	METAL CHIP	10K	5%	1/10W
R173	1-216-077-00	RES-CHIP	15K	5%	1/10W
R181	1-216-078-00	RES-CHIP	16K	5%	1/10W
R182	1-216-073-00	METAL CHIP	10K	5%	1/10W
R183	1-216-077-00	RES-CHIP	15K	5%	1/10W
		< NETWORK RESISTOR >			
RN101	1-233-576-11	RES, CHIP NETWORK 100			
		< SWITCH >			
S101	1-771-853-11	SWITCH, DETECTION (LIMIT)			
		< VIBRATOR >			
X101	1-781-776-21	VIBRATOR, CRYSTAL (16.9344MHz)			

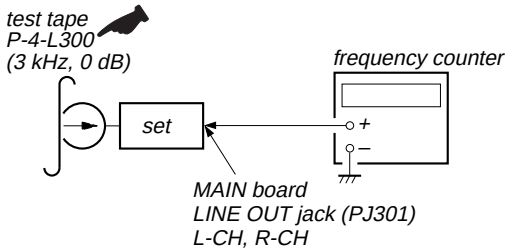
****

3. CORRECTION (Page 13)

☛ : indicates corrected portion.

Playback level Confirmation and Adjustment

Procedure:
Mode: Playback



Confirm playback level is within specification values as follows.
If these levels are out of specification values, adjust the RV151 (L-CH) and RV251 (R-CH) on the MAIN board so that the level meter reading become within specification values.

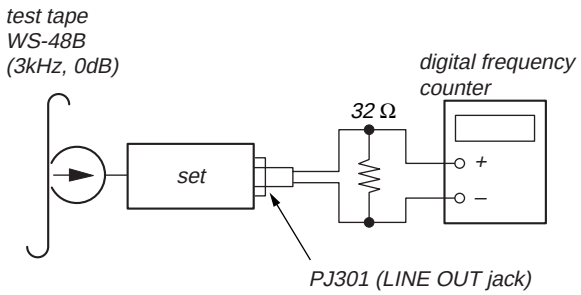
Specification values:
PJ301 PB level: 301.5 to 338.3 mV (–8.2 to –7.2 dB) level difference between the channels: within ±0.5 dB

Adjustment Location: MAIN board

☛ **Added**

Tape Speed Adjustment

Procedure :
Mode : Playback



Adjustment Value :
Adjust the tape speed adjustment control inside motor, so that the frequency counter reading becomes 3,000 Hz ± 90 Hz.

Adjustment Location :
Loading motor in mechanism deck (TAPE DECK BLOCK)

Sony Corporation
Audio Entertainment Group

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MEMO

REVISION HISTORY

Clicking the version allows you to jump to the revised page.
Also, clicking the version at the upper right on the revised page allows you to jump to the next revised page.

Ver.	Date	Description of Revision
1.0	2000.03	New
	2000.06	SUPPLEMENT-1
	2000.09	SUPPLEMENT-2
1.1	2002.07	Supply form of base unit section was corrected (SPM-02050)